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NEW MEXICO OIL CONSERVATION DIVISION

- Engineering Bureau -





ADMINISTRATIVE APPLICATION CHECKLIST

	THE DHECKLISTIS	MANDATORY FOR ALL ADMINISTRATIVE A WHICH REQUIRE PROCESSIN	PPLICATIONS FOR EXCEPTIONS TO DIVISION NG AT THE DIVISION LEVEL IN SANTA FE	ON RULES AND REGULATIONS
Арр	00-0H0] 1-09]	andard Location] [NSP-Non-Stan- wnhole Commingling] [CTB-Lea Pool Commingling] [OLS - Off-Lea [WFX-Waterflood Expansion] [SWD-Salt Water Disposal]	dard Proration Unit] [SD-Simultan se Commingling] [PLC-Pool/Lea ease Storage] [OLM-Off-Lease M [PMX-Pressure Maintenance Expa [IPI-Injection Pressure Increase rtification] [PPR-Positive Produ	ise Commingling] leasurement] insion] e]
	TYPE OF A [A]	PPLICATION - Check Those Will Location - Spacing Unit - Simu NSL NSP S	ltaneous Dedication	
	Chec [B]	k One Only for [B] or [C] Commingling - Storage - Measi DHC CTB P		LM
	[C]	Injection - Disposal - Pressure I	ncrease - Enhanced Oil Recovery WD	PR
	[D]	Other: Specify		-
[2]	NOTIFICAT [A]		Those Which Apply, or Does Not iding Royalty Interest Owners	Apply
	[B]	Offset Operators, Leasehol	ders or Surface Owner	
	[C]	Application is One Which	Requires Published Legal Notice	
	[1)]	Notification and/or Concur US Bureau of Land Management - Come	rent Approval by BLM or SLO missioner of Public Lands, State Land Office	
	[11]	For all of the above, Proof	of Notification or Publication is At	tached, and/or,
	[[·]	Waivers are Attached		
***		CURATE AND COMPLETE IN ATION INDICATED ABOVE.	NFORMATION REQUIRED TO	PROCESS THE TYPE
4) ggr delk	cult, saccurate :		formation submitted with this applicable whedge. I also understand that no are submitted to the Division.	
	Note	: Statement must be completed by an in	dividual with managerial and/or supervis	ory capacity.
e	e eero	Ni ₂ t at my	Figle	Date
			Harrist A. James	



Devon Energy Corporation 20 North Broadway Oklahoma City, Oklahoma 73102-8260

March 29, 2007

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

RE:

Form C-108, Application for Authorization to Inject

Caballo 9 State #1 API#: 30-025-34577 Lea County, NM Section 9, T23S, R34E

Gentlemen:

Please find attached Devon Energy Production Company, LP's Form C-108, Application for Authorization to Inject. Devon's application proposes to dispose of produced waters from the Delaware and Devonian formations into the Delaware Bell Canyon and Delaware Cherry Canyon formations utilizing the Caballo 9 State #1 wellbore.

A copy of this application is being filed with the OCD-Artesia office, surface land owner, and appropriate leasehold interest operators.

If you have any questions, please contact Bill Greenlees at (405)-552-8194 or myself at (405)-552-4615. Thank you for your cooperation in this matter.

Sincerely,

Ronnie Slack

Engineering Technician

Ronnie Slack

RS/rs

Enclosure

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

FORM C-108 Revised June 10, 2003

APPLICATION FOR AUTHORIZATION TO INJECT

I.	PURPOSE: Secondary Recovery Pressure Maintenance X Disposal Storage Application qualifies for administrative approval? X Yes No
II.	OPERATOR:Devon Energy Production Company, LP
	ADDRESS:20 North Broadway, Suite 1500, Oklahoma City, Oklahoma 73102
	CONTACT PARTY:Ronnie SlackPHONE: _405-552-4615
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 XNo 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:
	 Proposed average and maximum daily rate and volume of fluids to be injected; Whether the system is open or closed; Proposed average and maximum injection pressure; Sources and an appropriate analysis of injection fluid and compatibility with the receiving formation if other than reinjected produced water; and, 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:Ronnie Slack TITLE:Engineering Technician
	NAME:Ronnie Slack TITLE: Engineering Technician SIGNATURE: DATE: DATE:
*	E-MAIL ADDRESS:Ronnie.Slack@DVN.com

DISTRIBUTION: Original and one copy to Santa Fe with one copy to the appropriate District Office

III. WELL DATA

- A. The following well data must be submitted for each injection well covered by this application. The data must be both in tabular and schematic form and shall include:
 - (1) Lease name; Well No.; Location by Section, Township and Range; and footage location within the section.
 - (2) Each casing string used with its size, setting depth, sacks of cement used, hole size, top of cement, and how such top was determined.
 - (3) A description of the tubing to be used including its size, lining material, and setting depth.
 - (4) The name, model, and setting depth of the packer used or a description of any other seal system or assembly used.

Division District Offices have supplies of Well Data Sheets which may be used or which may be used as models for this purpose. Applicants for several identical wells may submit a "typical data sheet" rather than submitting the data for each well.

- B. The following must be submitted for each injection well covered by this application. All items must be addressed for the initial well. Responses for additional wells need be shown only when different. Information shown on schematics need not be repeated.
 - (1) The name of the injection formation and, if applicable, the field or pool name.
 - (2) The injection interval and whether it is perforated or open-hole.
 - (3) State if the well was drilled for injection or, if not, the original purpose of the well.
 - (4) Give the depths of any other perforated intervals and detail on the sacks of cement or bridge plugs used to seal off such perforations.
 - (5) Give the depth to and the name of the next higher and next lower oil or gas zone in the area of the well, if any.

XIV. PROOF OF NOTICE

All applicants must furnish proof that a copy of the application has been furnished, by certified or registered mail, to the owner of the surface of the land on which the well is to be located and to each leasehold operator within one-half mile of the well location.

Where an application is subject to administrative approval, a proof of publication must be submitted. Such proof shall consist of a copy of the legal advertisement which was published in the county in which the well is located. The contents of such advertisement must include:

- (1) The name, address, phone number, and contact party for the applicant;
- (2) The intended purpose of the injection well; with the exact location of single wells or the Section, Township, and Range location of multiple wells;
- (3) The formation name and depth with expected maximum injection rates and pressures; and,
- (4) A notation that interested parties must file objections or requests for hearing with the Oil Conservation Division, 1220 South St. Francis Dr., Santa Fe, New Mexico 87505, within 15 days.

NO ACTION WILL BE TAKEN ON THE APPLICATION UNTIL PROPER PROOF OF NOTICE HAS BEEN SUBMITTED.

NOTICE: Surface owners or offset operators must file any objections or requests for hearing of administrative applications within 15 days from the date this application was mailed to them.

INJECTION WELL DATA SHEET

OPERATOR: Devon Energy Production Company, LP				
WELL NAME & NUMBER:CABALLO 9 STATE #1				
WELL LOCATION: 1650' FNL & 660' FWL	H.	Sec 9	T23S	_R34E
FOOTAGE LOCATION	UNIT LETTER	SECTION	JIHSNMOJ	KANGE
WELLBORE SCHEMATIC		WELL CONSTR Surface Casing	WELL CONSTRUCTION DATA Surface Casing	
	Hole Size: 26"		Casing Size: 20"	
	Cemented with:	1525sx.	or	fft³
	Top of Cement:	Surface	Method Determined: Circ. cement	irc. cement
		Intermediate Casing	e Casing	
	Hole Size: 17-1/2" 12-1/4"		Casing Size 13-3/8".	
	Cemented with: $\frac{13-3/8^{\circ}}{9-5/8^{\circ}}$: $\frac{1260 \text{ sx}}{2250 \text{ sx}}$.	": 1260 sx. ?: 2250 sx	or	ft ³
	Top of Cement: <u>13-3/8": Surface</u>	3-3/8": Surface 9-5/8": 1400'	Method Determined: 13-3/8" Circ Cmt. 9-5/8": Temp Survey	3-3/8" Circ
		Production Casing	. Casing	
	Hole Size:8-1/2"_		Casing Size: 7"	,
	Cemented with:	1250sx.	or	ft.3
	Top of Cement:	3750	Method Determined: _Temp Survey	Temp Survey
	Total Depth:1	13,450′		
		Injection Interval	<u>nterval</u>	
	\(\rangle \)	5,040 ² feet 5,760 ³ feet	to 5,760' to 7,028'	(Perforated) (Perforated)

INJECTION WELL DATA SHEET

Poly-Lined	
Lining Material:)
3-1/2"	
abing Size:	,

Type of Packer: _____7" IPC_____

Packer Setting Depth: ___+/-5000'_

Other Type of Tubing/Casing Seal (if applicable):

Additional Data

1. Is this a new well drilled for injection?

Yes X No

If no, for what purpose was the well originally drilled? Gas Well in Strawn & Atoka (commingled open hole)

- Name of the Injection Formation: Delaware Bell Canyon from 5,040' to 5,760' and Delaware Cherry Canyon from 5,760' તં
- 3. Name of Field or Pool (if applicable): Antelope Ridge
- 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. 4.

Strawn Open Hole: 11,800' – 11,932' and Atoka Open Hole 11,933' – 12,250': Plugged back with CIBP (a) 11,800' + 35' cement. CIBP @ 8,900' + 35' cement. Bone Spring currently open from 8,494' to 8,531'.

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

The next lower productive gas zones in the area of review are the Strawn (11800-11932) and Aroka (11933-12250). The The lowest productive oil zone in the area of review is the Bone Spring (8494-8531), which is currently producing in the Strawn and Atoka were commingled in the Caballo 9 State #1, via open hole completion, but have been plugged off. No Caballo 9 State #1. No higher oil zones have been tested above the Bone Spring in the area of review. higher gas zones have been tested above this depth in the area of review

C108 ITEM III - WELL DATA

Devon Energy Production Company, LP Proposed Injector: Caballo 9 State #1

III. Well Data--On Injection Well

A. Injection Well Information

(1) Lease Caballo 9 State

Well No

Location

1650' FNL & 660' FWL

Sec,Twn,Rnge

Sec 9, T23S-R34E, Unit Letter E

Cnty, State

Lea County, New Mexico

(2) Casing

20", 94#, J55/H40, @ 730' in 26" hole. Cmt'd w/ 1525 sxs.

Cement circulated to surface.

13-3/8", 61#, J55, @ 2,265' in 17-1/2" hole. Cmt'd w/ 1260 sxs.

Cement circulated to surface.

9-5/8", 40#, N80, J55, K55, @ 5,012'. Cmt'd w/ 2250 sxs.

TOC @ 1400' (Temp survey-4/9/99)

7", 26# & 23#, S95, @ 11,800'. Cmt'd w/ 1250 sxs.

i(TOC @ 3750' (Temp survey-4/23/99)

Injection Tubing

24/18/, 6.5#, Poly lined tubing run to +/- 5,000'

(4) Packer

7" IPC Packer @ +/- 5,000

B. Other Well Information

(1) Injection Formation: Field Name:

Delaware Bell Canyon & Delaware Cherry Canyon

Antelope Ridge

(2) Injection Interval:

Delaware Bell Canyon: 5,040' - 5 760'

Delaware Cherry Canyon: 5,760' - 7,028'

Devon is requesting that the Delaware Bell Canyon formation (5,040' - 5,760') and the Delaware Cherry Canyon formation (5,760' - 7,028') be permitted for salt water disposal. Disposal waters from the Delaware and Devonian formations will injected into Delaware Bell Canyon and Delaware Cherry Canyon formations.

(3) Original Purpose of Wellbore:

The Caballo 9 State #1 was spud on March 23, 1999. It was completed May 22, 1999, as an open hole completion in the Strawn and Atoka formations. It was plugged back and recompleted to the Bone Spring formation on March 20, 2001.

(4) Other perforated intervals:

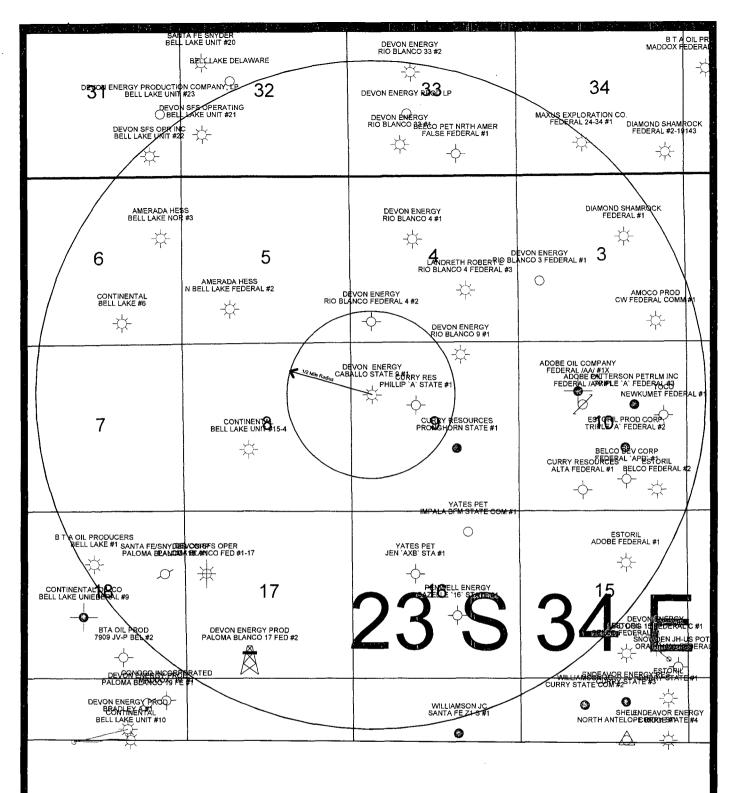
The only producing/perforated intervals in the Caballo 9 State #1 are as follows: Bone Spring: 8,494' to 8,531'. (Producing)

Strawn: Open hole completion 11,800' - 11,932'. (abandoned) Atoka: Open hole completion 11,933' - 12,250'. (abandoned)

(5) Give the depth to and the name of the next higher and next lower oil or gas zone in the area of the well if any.

The lowest productive oil zone in the area of review is the Bone Spring, which is currently producing in the Caballo 9 State #1. No higher oil zones have been tested above the Bone Spring in the area of review.

The next lower productive gas zones in the area of review are the Strawn and Aroka. The Strawn and Atoka were commingled in the Caballo 9 State #1, via open hole completion, but have been plugged off. No higher gas zones have been tested above this depth in the area of review.



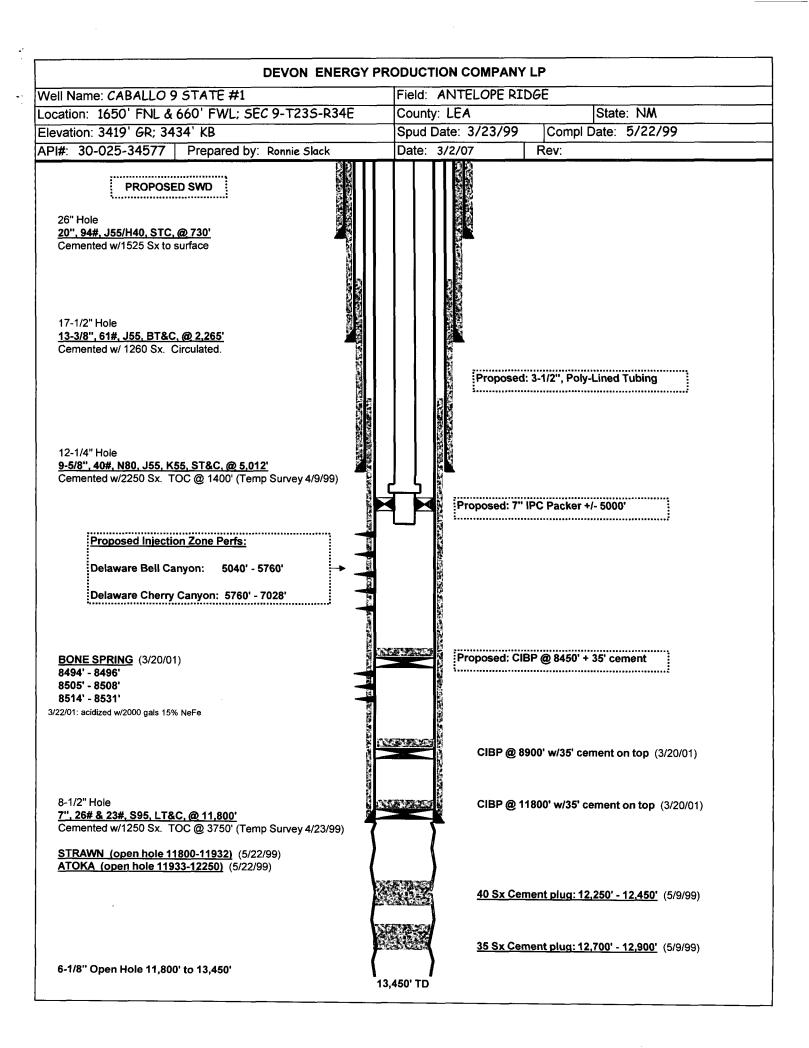
C108-Item V

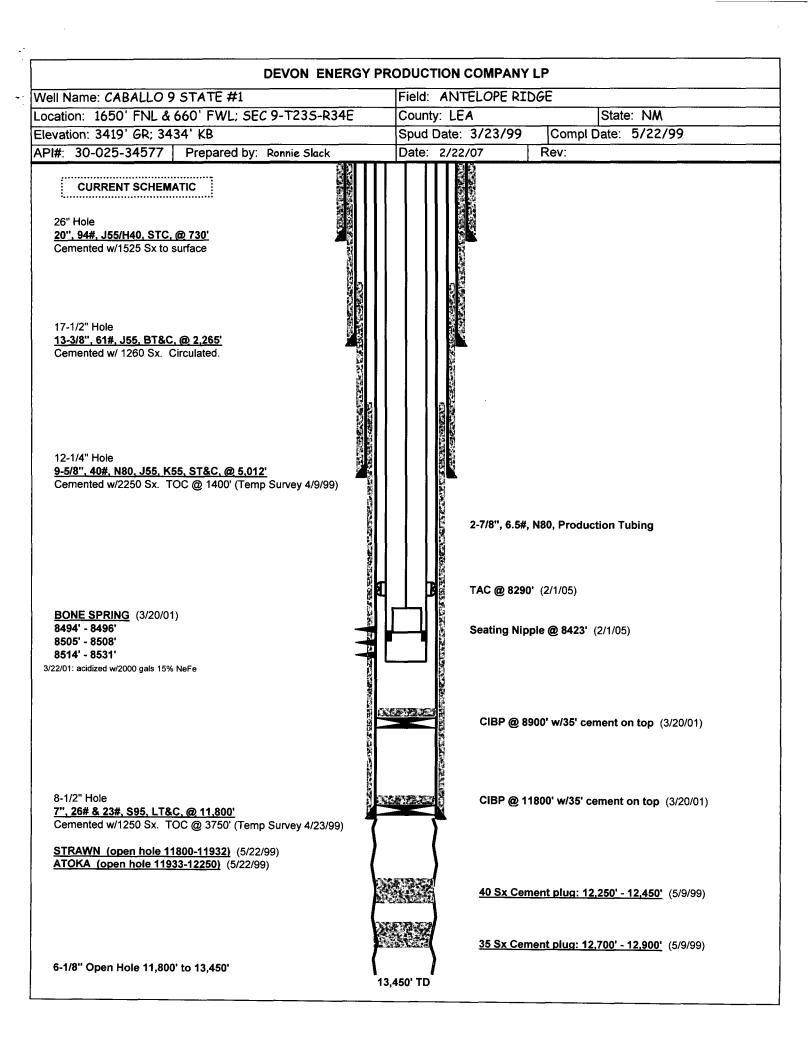
Map with 1/2 Mile & 2 Mile Review Area Proposed Injector; Caballo 9 State #1 Lea County; Sec 9-T23S-R34E



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Page

C108 ITEM VIWell Tal Devon Energy Product Proposed Injector: Cal	Tabulation in Review Area luction Company, LP Caballo 9 State #1	G G													
Operator	Well Name	API	County	County Sec Twn Rnge Type	vn Rng	е Туре	Status	Spud Date	Comp Date	P	PBTD	Comp	Comp Interval	Casing Program	Cement / TOC
Devon Energy Prod Co LP	Caballo 9 State 1	30-025-34577	Lea	9 23	23S 34E	Ö	Act Prod	03/23/99	05/22/99	13450	8865	Bone Spring Strawn/Atoka	8494-8531 (Open) Open hole 11800-12250 (plugged)	20", 94#, J55 & H40, @ 730' 13-3/8",61#, J55, @ 2265' 9-5/8", 40#, N80, J55,K55, @ 5012' 7", 26# & 23#, S95, @ 11800'	1525 sx / Surf (circ) 1260 sx / Surf (circ) 2250 sx / 1400' (Temp survey) 1250 sx / 3750' (Temp survey)
Devon Energy Prod Co LP	Rio Blanco 4 Federal 2	30-025-34605	Lea	4 23S	3S 34E	¥.	P&A	07/02/99	P&A 8/29/99	13335	Surface	13335 Surface Never Completed	Never Completed-Plugged & Abandoned	20", 94#, X56, @ 697' 13-3/8",61#, J55, @ 2220' 9-5/8", 40#, S95, @ 5061' 7", 26#, P110, @ 11886'	120 sx / Surf (circ) 1125 sx / Surf (circ) 1525 sx / Surf (circ) 1000 sx / Cut & pulled @ 6260'
Curry Resources	Phillips A State 1	30-025-29099	ea	0	238 34E		Never drilled	₹	و 2 	¥	ď Z	Never drilled	Form C-101, notice of attention to drill expired per letter from OCD dated 12/6/85. Well never drilled. Pl/dwights records note that 20" conductor set at 80" prior to Never Completed expiration of Form C-101.	20" Conductor to 80'	NA





DEVON ENERG	Y PRODUCTION COMPANY LP
Well Name: RIO BLANCO 4 FEDERAL #2	Field: NORTH BELL LAKE
Location: 660' FSL & 660' FWL; SEC 4-T23S-R34E	County: LEA State: NM
Elevation: 3419' GR	Spud Date: 7/2/99
API#: 30-025-34605 Prepared by: Ronnie Slack	Date: 2/22/07 Rev:
PLUGGED & ABANDONED 8/29/99	Plug #10: 10 Sx, 20' to surface.
26" Hole 20", 94#, X56, @ 697' Cemented w/ 1200 Sx. Circulated.	Plug #9: 50 Sx, 609' - 750'.
17-1/2" Hole 13-3/8", 61#, J55, @ 2,220' Cemented w/1125 Sx. Circulated	Plug #8: 50 Sx, 2,112' - 2,262'.
12-3/4" Hole <u>9-5/8", 40#, S95, @ 5,061'</u> Cemented w/1525 Sx. Circulated.	Plug #7: 100 Sx, 4,950' - 5,111'. Tagged TOC 4,950'
	Plug #6: 75 Sx, 6,116' - 6,350' 7" casing cut & retrieved at 6260'
	Plug #5: 50 Sx, 8,519' - 8,255'
	Plug #4: 50 Sx, 10,270' - 10,535'
8-3/4" Hole <u>7", 26#, P110, @ 11,886'</u> Cemented w/1000 Sx. TOC @ 6399'	Plug #3: 75 Sx, 11,443' - 11,850' CIBP @ 11,850'
	Plug #2: 12,080' - 12,280'
	Plug #1: 65 Sx 12,700' - 13,070' 13,335' TD

CURF	RY RESOURCES	
Well Name: PHILLIPS A STATE #1	Field: UNDESIGNA	ATED
Location: 1980' FNL & 1980' FWL; SEC 9-T23S-R34E	County: LEA	State: NM
Elevation: 3413' GL	Spud Date: NA	Compl Date: NA
API#: 30-025-29099 Prepared by: Ronnie Slack	Date: 2/22/07	Rev:
	Date: 2/22/07 NOTE: Form Control of the second sec	Compl Date: NA Rev: -101, notice of intention to drill, expired per letter e OCD Hobbs District Office, dated December 6, This well was never drilled. this records indicate that 20" conductor was set at r to expiration of Form C-101.

C-108 - Section VII to XII
Devon Energy Production Company, LP
Proposed Injector: Caballo 9 State #1

VII Attach data on the proposed operation, including:

Proposed average injection rate: 4000 BWPD
 Proposed maximum injection rate: 7000 BWPD

(2) The system will be a closed system.

(3) Proposed average injection pressure: 1000 psi Proposed max injection pressure: 1150 psi

- (4) The proposed injection fluid is produced water from the Delaware and Devonian formations that will be re-injected into the Delaware Bell Canyon and Delaware Cherry Canyon formations.
- Water analysis' are attached for the Rio Blanco 33-2, Rio Blanco 4-1, and the Paloma Blanco 17-1. The Rio Blanco 33-2 & 4-1 are for produced waters from the Devonian. The Paloma 17-1 is for produced waters from the Delaware. Similar formation waters will be injected into the Caballo 9 State #1
- The proposed injection interval is located in the Delaware Bell Canyon and the Delaware Cherry Canyon formations. The Delaware is a Permian age formation with a lithology composition of sandstone, siltstone, and shale. The Bell Canyon formation is found from 5025' to 5760' (735' thick). The Cherry Canyon formation is found from 5760' to 7555' (1795' thick).

Per State Engineers Average Depth of Water Report, the average depth to fresh water in the review area is 280' deep. Surface casing has been set at 730' and cemented to surface. The 1st intermediate casing is set at 2,265' and cemented to surface to protect underground fresh water souces.

- The proposed injection zone will be acidized with +/- 5000 gallons 7.5% NeFe and fraced with +/- 120,000 lb proppant.
- X Logging & test data have previously been submitted to the OCD.
- A listing of fresh water wells surrounding the Caballo 9 State #1 per New Mexico Office of the State Engineer POD/Surface Data Report is submitted. Attached is a fresh water analysis from the Keller Station, which is representaive of the RV, LLC Keller well, Sec 8, T23S, R34E, permit number CP 00876, pod number CP 0872
- An examination of this area has determined there are no open faults or other hydrologic connection between the disposal zone and any underground drinking water.

C108-Item VII #5 Disposal Formation Water Analysis **Devonian Formation** Rio Blanco 33-2 Sec 33-T22S-R34E

North Permian Basin Region P.O. Box 740 Sundown, TX 79372-0740 (806) 229-8121

Lab Team Leader - Sheila Hernandez

(432) 495-7240

Water Analysis Report by Baker Petrolite

Company:

DEVON ENERGY CORPORATION

Sales RDT:

33517.1

Region:

PERMIAN BASIN

Account Manager: SHAWNA MATTHEWS (505) 910-9393

Area:

ARTESIA, NM

Sample #:

326831

Lease/Platform:

RIO BLANCO

Analysis ID #:

47314

Analysis Cost:

\$40.00

Formation:

33-2 Entity (or well #):

DEVONIAN

Sample Point:

SEPARATOR

Summ	ary		A	nalysis of Sa	mple 326831 @ 75	°F	
Sampling Date:	12/16/04	Anions	mg/l	meq/l	Cations	mg/l	meq/l
Analysis Date:	12/22/04	Chloride:	40139.0	1132.17	Sodium:	25431.7	1106.22
Analyst:	SALLY MOORE	Bicarbonate:	228.1	3.74	Magnesium:	99.0	8.14
FDC (mail on alma).	67936.8	Carbonate:	0.0	0.	Calcium:	761.0	37.97
Analysis Date: Analyst: TDS (mg/l or g/m3): Density (g/cm3, tonno Anion/Cation Ratio: Carbon Dioxide: Oxygen: Comments:		Sulfate:	1062.0	22.11	Strontium:	19.0	0.43
- ·• ·	/m3): 1.051	Phosphate:			Barium:	2.0	0.03
Anion/Cation Ratio:	1	Borate:			iron:	23.0	0.83
		Silicate:		1	Potassium:	172.0	4.4
					Aluminum:		
Carbon Dioxide:	100 PPM	Hydrogen Sulfide:		140 PPM	Chromium:		
Carbon Dioxide: Oxygen:		pH at time of sampling:	at time of compliant		Copper:		
		1		6.1	Lead:		
		pH at time of analysis:			Manganese:		
		pH used in Calculation:	:	6.1	Nickel:		

Condi	itions		Values C	alculated	at the Give	n Conditi	ons - Amou	nts of Sc	ale in lb/10	00 bbl		
Temp	Gauge Press.		alcite aCO ₃		sum 04*2H ₂ 0	1	ydrite aSO ₄		estite rSO ₄		rite aSO ₄	CO ₂ Press
°F	psi	Index	Amount	Index	Amount	Index	Amount	Index	Amount	Index	Amount	psi
80	0	-0.95	0.00	-0.88	0.00	-0.92	0.00	-0.69	0.00	1.44	0.98	1.57
100	0	-0.83	0.00	-0.93	0.00	-0.90	0.00	-0.71	0.00	1.26	0.98	2
120	0	-0.70	0.00	-0.96	0.00	-0.85	0.00	-0.71	0.00	1.10	0.98	2.45
140	0	-0.57	0.00	-0.99	0.00	-0.79	0.00	-0.70	0.00	0.97	0.98	2.91

Note 1: When assessing the severity of the scale problem, both the saturation index (SI) and amount of scale must be considered.

Note 2: Precipitation of each scale is considered separately. Total scale will be less than the sum of the amounts of the five scales.

Note 3: The reported CO2 pressure is actually the calculated CO2 fugacity. It is usually nearly the same as the CO2 partial pressure.

C108-Item VII #5 Disposal Formation Water Analysis **Devonian Formation** Rio Blanco 4-1 Sec 4-T23S-R34E

North Permian Basin Region P.O. Box 740 Sundown, TX 79372-0740 (806) 229-8121

Lab Team Leader - Sheila Hernandez

(432) 495-7240

Water Analysis Report by Baker Petrolite

Company:

DEVON ENERGY CORPORATION

Sales RDT:

33517.1

Region:

PERMIAN BASIN

Account Manager: SHAWNA MATTHEWS (505) 910-9393

Area:

ARTESIA, NM

Sample #:

326817

Lease/Platform:

Analysis ID #:

RIO BLANCO

47310

Entity (or well #):

4-1

Analysis Cost:

\$40.00

Formation:

DEVONIAN

Sample Point:

SEPARATOR

Sumr	mary		A	nalysis of Sa	mple 326817 @ 75	°F	
Sampling Date:	12/16/04	Anions	mg/l	meq/l	Cations	mg/l	meq/l
Analysis Date: Analyst:	12/22/04 SALLY MOORE	Chloride: Bicarbonate:	41669.0 228.1	1175.33 3.74	Sodium: Magnesium:	25492.9 162.0	1108.88 13.33
TDS (mg/l or g/m3): Density (g/cm3, tonn Anion/Cation Ratio:	70316.5 ne/m3): 1.053	Carbonate: Sulfate: Phosphate: Borate: Silicate:	0.0 1011.0	0. 21.05	Calcium: Strontium: Barium: Iron: Potassium:	1361.0 34.0 1.5 7.0 350.0	67.91 0.78 0.02 0.25 8.95
Carbon Dioxide: Oxygen: Comments:	100 PPM	Hydrogen Sulfide: pH at time of sampling: pH at time of analysis: pH used in Calculation	:	210 PPM 6.1 6.1	Aluminum: Chromium: Copper: Lead: Manganese: Nickel:		

Condi	itions		Values C	alculated	at the Give	n Conditi	ons - Amou	ınts of Sc	ale in lb/10	00 bbl		
Temp	Gauge Press.		alcite aCO ₃	, ,	sum 04*2H ₂ 0	l	ydrite aSO ₄		estite rSO ₄		rite aSO ₄	CO ₂ Press
°F	psi	Index	Amount	Index	Amount	Index	Amount	Index	Amount	Index	Amount	psi
80	0	-0.70	0.00	-0.68	0.00	-0.72	0.00	-0.49	0.00	1.27	0.65	1.54
100	0	-0.59	0.00	-0.72	0.00	-0.69	0.00	-0.50	0.00	1.09	0.65	1.96
120	0	-0.47	0.00	-0.76	0.00	-0.65	0.00	-0.50	0.00	0.93	0.65	2.4
140	0	-0.34	0.00	-0.78	0.00	-0.58	0.00	-0.50	0.00	0.80	0.65	2.85

Note 1: When assessing the severity of the scale problem, both the saturation index (SI) and amount of scale must be considered.

Note 2: Precipitation of each scale is considered separately. Total scale will be less than the sum of the amounts of the five scales.

Note 3: The reported CO2 pressure is actually the calculated CO2 fugacity. It is usually nearly the same as the CO2 partial pressure.

C108-Item VII #5

Disposal Formation Water Analysis
Delaware Formation
Paloma Blanco 17-1
Sec 17-T23S-R34E

MAR-3-2007 15:34 FROM:

TO: 93962679

P:1/2



Water Analysis

Date: 03-Mar-07

2708 West County Road, Hobbs NM 88249 Phone (505) 392-5556 Fax (505) 392-7307

Analyzed For

Sample Source			Sample #	1	
			Depth	•	
Formation					
Specific Gravity	1,158	-	SG 🙋	60 °F	1.157
pH	5.93		St	lfides	Absent
Temperature (*F)	68		Reducing A	gents	
Cations					
Sodium (Calc)		in Mg/L	77,524	in PPM	67,027
Calcium .		in Mg/L	10,000	in PPM	8,646
Magnesium		in Mg/L	1,920	in PPM	1,660
Soluable Iron (FE2)		in Mg/L	50.0	in PPM	43
Anions		,			
Chlorides		in Mg/L	142,000	in PPM	122,774
Suitates		in Mg/L	275	in PPM	238
Bicarbonates		in Mg/L	244	in PPM	211
Total Hardness (as CaCO	3)	in Mg/L	33,000	in PPM	28,532
Total Dissolved Solids (Ca	lc)	in Mg/L	232,013	in PPM	200,599
Equivalent NaCl Concentra	ation	in Mg/L	201,511	in PPM	174,227
Scaling Tendencies			·		
Calcium Carbonate Index 8elow 500,000	Remote / 500	,000 - 1,000,00	0 Possible / Above	_	2,440,000
Calcium Sulfate (Gyp) Indi		000 - 48 000 W	Possible / Above 1		2,750,000
This Calculation is only an app regulation.					

.049 @68F

Report # 2429

NEW MEXICO OFFICE OF THE STATE ENGINEER
POD / SURFACE DATA REPORT FOR FRESH WATER WELLS
Township 23S Range 34E Sections: 4,5,8,9
Lea County, NM
Caballo 9 State #1 SWD application
Water sample submitted for RV, LLC Keller

	(in feet)											
		Water	255							305	302	305
	Depth	Well	497							200	200	200
		Date								10/03/97	10/03/97	10/03/97
	Start	Date	9/27/74							19/29/97	29/53/97	19/29/97
		ing	5901 (3575901	3575901	3575901	3575901	3575901	3575901	7303 (7303 (7303 (
	ers)	ting N	41897	41897	41897	41897	41897	41897	41897	41275	41275	41275
	UTM are in Mete	UTM Zone East	13 6	13 6	13 6	13 6	13 6	13 6	13 6	13 6	13 6	13 641275 357
		>										
	X Y are in Fe	Zone X										
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=SW 4:	allest	Sec	œ	ω	∞	ω	∞	œ	∞	∞	ω	∞
2=NE 3	st to sm	Rng	34E	34E	34E	34E	34E	34E	34E	34E	34E	34E
marters are 1=NW 2=NF 3=SW 4=SF)	quarters are biggest to smallest	Lws	238	238	23S	238	238	23S	23S	23S	238	238
(ansutate	(quarters	Source	Shallow							Shallow	Shallow	Shallow
		POD Number	CP 00556	CP 00556 (1) EXP	CP 00556 (2) EXP	CP 00556 (3) EXP	CP 00556 (4) EXP	CP 00629 EXP	CP 00629 (E) 1 EXP	CP 00872	CP 00872	CP 00872
		Owner	J.C. MILLS	J.C. MILLS	J.C. MILLS	J.C. MILLS	J.C. MILLS	J. C. MILLS	J. C. MILLS	JIM KELLER RV, LLC	RV, LLC KELLER	PENWELL ENERGY
	(acre ft per annum)	Diversion	0	0	0	0	0	0	ERROR	0	0	0
	(acre ft	Nse	PRO	STK	PRO	PRO	PRO	STK	STK	EXP	MOO	PRO
								CP 00629				

5

Record Count:



C108-Item XI
Fresh Water Analysis
RV, LLC Keller
Pod Number CP 00872
Sec 8-T23S-R34E

Water Analysis

Date: 16-Mar-07

2708 West County Road, Hobbs NM 88240 Phone (505) 392-5556 Fax (505) 392-7307

Analyzed For

Ke	ller Station	L	44	B. b B. 4 3 -	
		Lea		New Mexico	
Sample Source				1	
		Depth			
1.000		S G @ (50 °F	1.002	
8.10			.,	Absent	
70		Reducing A	gents	Absent	
	in Mg/L	247	in PPM	247	
	in Mg/L	40	in PPM	40	
	in Mg/L	12	in PPM	12	
	in Mg/L	0.0	in PPM	0	
			• • • • • • • • • • • • • • • • • • • •		
	in Mg/L	160	in PPM	160	
	in Mg/L	250	in PPM	250	
	in Mg/L	244	in PPM	244	
3)	in Mg/L	150	in PPM	150	
(c)	in Mg/L	953	in PPM	951	
ation	in Mg/L	659	in PPM	657	
		•			
				9,760	
Remate / 500,	,000,000 - 1,000,000	Possible / Above 1,	900,000 Probable	•	
				10,000	
aximation an	d is only valid b	efore treatment of	a Well or severs	i wooks after	
	8.10 76 3) (c) ation Remote / 500,	in Mg/L in Mg/	1.000 SG @ 6 8.10 Sui 70 Reducing Ag in Mg/L 247 in Mg/L 40 in Mg/L 12 in Mg/L 12 in Mg/L 0.0 in Mg/L 250 in Mg/L 250 in Mg/L 244 3) in Mg/L 353 ation in Mg/L 953 ation in Mg/L 659 Remate / 500,000 - 1,000,000 Possible / Above 1,000 example of sonly valid before treatment of example 100,000 and 100,000 possible / Above 10,000,000 and 100,000 possible / Above 10,000,000 and 150 only valid before treatment of example 100,000 and 150 only valid before treatment of example 100,000 and 150 only valid before treatment of 1500,000 and 15	1.000 SG @ 60°F 8.10 Sulfices 70 Reducing Agents in Mg/L 247 in PPM in Mg/L 40 in PPM in Mg/L 12 in PPM in Mg/L 10.0 in PPM in Mg/L 250 in PPM in Mg/L 250 in PPM in Mg/L 244 in PPM in Mg/L 250 in PPM in Mg/L 250 in PPM in Mg/L 260 in PPM in Mg/L 353 in PPM ation in Mg/L 659 in PPM Ation in Mg/L 659 in PPM Remate / 500,000 - 1,000,000 Possible / Above 1,000,000 Probable ex Remate / 500,000 - 10,000,000 Possible / Above 10,000,000 Probable ex Remate / 500,000 - 10,000,000 Possible / Above 10,000,000 Probable ex Remate / 500,000 - 10,000,000 Possible / Above 10,000,000 Probable ex Remate / 500,000 - 10,000,000 Possible / Above 10,000,000 Probable ex	

Report #

2436

Form C-108 Section XIV **Proof of Notice to Leasehold Operators**

Application For Injection in Caballo 9 State #1 Devon Energy Production Company, LP

Leasehold Operators within 1/2 mile of Caballo 9 State #1

Conoco Phillips

Attn: Tom Scarbrough

600 North Dairy Ashford, WL #-14066

Houston, TX 77079

Southwestern Energy Production Company

2350 N. Sam Houston Parkway East

Suite 300

Houston, TX 77032

Kaiser-Francis Oil Company

P.O. Box 21468

Tulsa, OK 74121-1468

Hayes Land & Production Company

Attn: Mr. William H. Bennett

P.O. Box 51047 Midland, TX 79710

Tipor Resources Oil & Gas

305 Entex Building Houston, TX 77002 Certified receipt No.

7005 3110 0003 6533 3264

Certified receipt No.

7005 3110 0003 6533 3295

Certified receipt No.

7005 3110 0003 6533 3257

Certified receipt No.

7005 3110 0003 6533 3318

Certified receipt No.

7005 3110 0003 6533 3240

A copy of this application has been mailed to the above leasehold operators by certified mail, pertaining to Devon Energy's application for salt water disposal in the Caballo 9 State #1

Date Mailed: 3/29/07

Signature: Lonni Slack

Date:

3/29/07

Ronnie Slack, Engineering Technician Devon Energy Production Co., L.P. 20 N. Broadway, Suite 1500 Oklahoma City, OK 73102

Form C-108 Section XIV <u>Proof of Notice to Mineral Interest Owner</u>

Application For Injection in Caballo 9 State #1 Devon Energy Production Company, LP

Mineral Interest Owner

Bureau of Land Management

Attn: Alexis Swoboda 2909 West 2nd Street Roswell, NM 88201 Certified receipt No.

7005 3110 0003 6533 3288

State of New Mexico

Commissioner of Public Lands

P.O. Box 1148

Santa Fe, NM 87504-1148

Certified receipt No.

7005 3110 0003 6533 3325

A copy of this application has been mailed to the above mineral interest owner by certified mail, pertaining to Devon Energy's application for salt water disposal in the Caballo 9 State #1

Ronnie Slack, Engineering Technician Devon Energy Production Co., L.P. 20 N. Broadway, Suite 1500 Oklahoma City, OK 73102

Form C-108 Section XIV Proof of Notice to Surface Land Owner

Application For Injection in Caballo 9 State #1 Devon Energy Production Company, LP

Surface Land Owner

Keller RV LC 2811 County Road 460 Oakley, KS 67748 Certified receipt No.

7005 3110 0003 6533 3301

A copy of this application has been mailed to the above surface land owner by certified mail, pertaining to Devon Energy's application for salt water disposal in the Caballo 9 State #1

Date Mailed: 3/29/07

Signature: <u>Komme Sta</u>

Date: 3

Ronnie Slack, Engineering Technician Devon Energy Production Co., L.P. 20 N. Broadway, Suite 1500 Oklahoma City, OK 73102 State of New Mexico. County of Lea.

I, KATHI BEARDEN

Publisher

of the Hobbs News-Sun, a newspaper published at Hobbs, New Mexico, do solemnly swear that the clipping attached hereto was published once a week in the regular and entire issue of said paper, and not a supplement thereof for a period.

of
weeks
Beginning with the issue dated
March 4 2007
and ending with the issue dated
March 4 200
Lachi Prender
D.I.I.I

Publisher Sworn and subscribed to before

5th me this. day of

March 2007Notary Public.

My Commission expires February 07, 2009

(Seal)



This newspaper is duly qualified to publish legal notices or advertisements within the meaning of Section 3, Chapter 167, Laws of 1937, and payment of fees for said publication has been made.

C108-Item XIII

Affidavit of Newspaper Publication Caballo 9 State #1 Sec 9-T23S-R34E

LEGAL NOTICE March 4, 2007

Devon Energy Production Company, LP, 20 North Broadway, Oklahoma City, OK 73102-8260 has filed form C-108 (Application for Authorization to Inject) with the New Mexico Oil Conservation Division seeking administrative approval for an injection well. The proposed well, the Caballo 9 State #1, located 1650' FNL & 660' FWL, Unit E, Section 9, Township 23 South, Range 34 East, in Lea County, New Mexico, will be used for salt water disposal. Disposal waters from the Delaware and Devonian will be injected into the Delaware Bell Canyon formation at a depth of 5040'-5760' and the Delaware Cherry Canyon formation at a depth of 5760'-7028' with a maximum pressure of 1150 psi and a maximum rate of 7000 BWPD.

All interested parties opposing the aforementioned must file objections or request for a hearing with the Oil Conservation Division, 1220 South Saint Francis Drive, Santa Fe, New Mexico 87505-5472, within 15 days. Additional information can be obtained by contacting Bill Greenlees at (405) 552-8194. #23066

03100039000 02591666

DEVON ENERGY CORPORATION 20 N. BROADWAY, SUITE 1500 OKLAHOMA CITY, OK 73102-8260



2007 APR 18 PM 12 16

Devon Energy Corporation 20 North Broadway Oklahoma City, Oklahoma 73102-8260 Fax 405-552-8113

April 13, 2007

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

Re: RE: SWD application: Caballo 9 State #1, API #3002534577

Dear Mr. Jones:

This letter is in answer to your questions concerning the proximity of the Caballo 9 State #1 to the Capitan Reef and the lithology above the injection formation, sands in the Delaware Mountain Group.

The enclosed map of the Thickness of the Permian Guadalupian Capitan Aquifer, published by W. L. Hiss in 1975, shows the location of the Capitan Reef. The Caballo well is shown about two miles basinward (southwest) of the reef trend. Hiss's cross section A - A' passes near the Caballo and includes the Bell Lake Unit #6, located about two miles northwest of the Caballo. Hiss interprets the BLU6 to be basinward of the steep fore-reef margin of the Capitan Reef. There is an important lithologic difference between the Capitan (permeable limestone) and the Castile (impermeable anhydrite).

The enclosed logs (mudlog, density-neutron, and lateralog) from the Caballo well show that the top of the Delaware Mountain Group (marked LMAR at 4883) is overlain by anhydrite (see the mudlog). Massive anhydrite was sampled as high as the first cuttings sample at 4450, and the character of the wireline logs indicates that the same lithology continues to 3488. Clearly, the Capitan Reef is not present in the Caballo well, and the injection formation is overlain by about 1400 feet of anhydrite.

If you have any additional questions concerning the geology near the Caballo 9 State #1, please call me.

Sincerely

Steven D. Hulke

Senior Geological Advisor

tere D. He Ola

Jones, William V., EMNRD

From: Jones, William V., EMNRD

Sent: Tuesday, April 10, 2007 8:27 PM

To: 'Ronnie.Slack@DVN.com'

Cc: Ezeanyim, Richard, EMNRD; Kautz, Paul, EMNRD; Sanchez, Daniel J., EMNRD

Subject: SWD Application: Caballo 9 State #1 API No. 30-025-34577

Hello Ronnie:

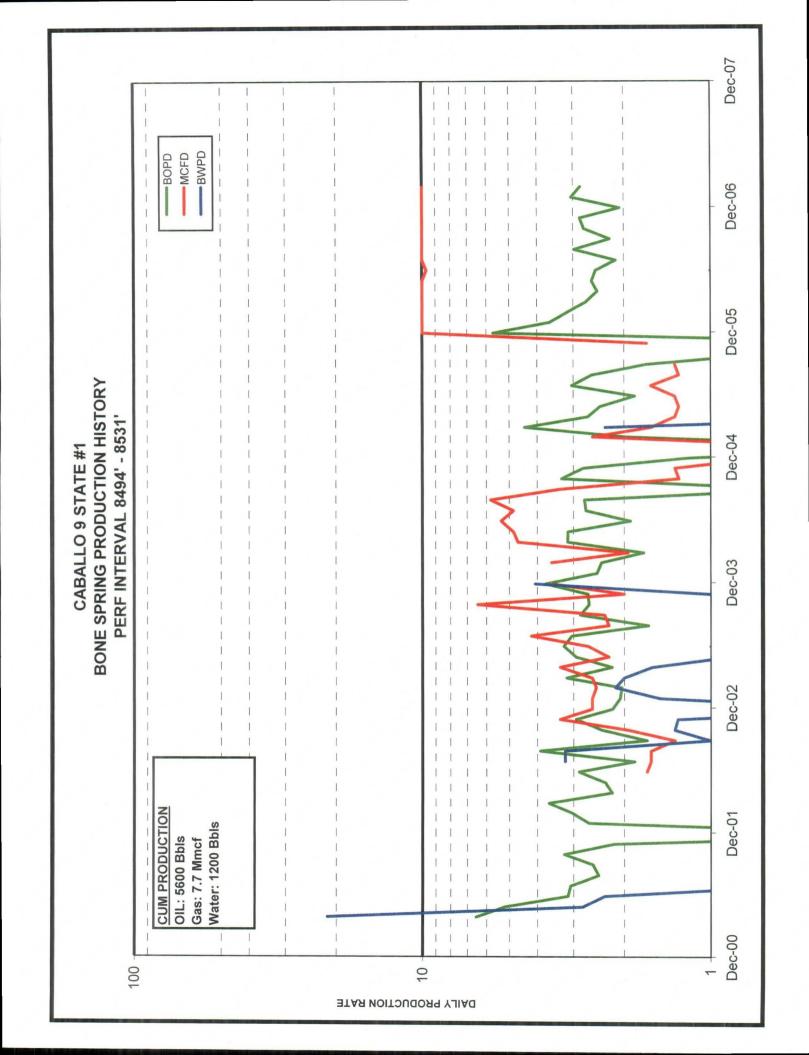
We received your application on behalf of Devon to inject into the Bell and Cherry Canyon in this well from 5040 to 7028 feet and have a couple questions and comments:

- We'll require Devon to plug back with a CIBP to approx 200 feet below the 7028 feet lowermost injection interval.
- 2) What was the cumulative production from the Bone Spring (8494 to 8531) and could you send a production plot for our files?
- 3) Would you please have your geologist talk a little about the lithology (and formation tops) above the Bell Canyon in this area. Looks like the Rustler ends about 1,420 feet and there is something from 3,500 feet to 4870 feet what is this? My maps show this well to be on the edge of the Capitan Reef. Realize you would be injecting below the Reef but would you talk a little about how the Reef is protected from water injection both vertically and laterally? What is your opinion of the salinity in the Reef in this area? The Bell Canyon looks very porous and permeable do you calculate 100% Sw in the upper Bell Canyon? Looks like at 10,000 feet and at 10160 feet are small hydrocarbon sands are these any good?

Overall the application looks fine. Please reply as soon as possible and I can release this on April 18.

Thank You,

William V. Jones PE New Mexico Oil Conservation Division 1220 South St. Francis Santa Fe, NM 87505 505-476-3448



,	531 FNL	Inje	ection Permit Ch	necklist 2/8/07		
085/	SWD Order Number _	1 6 7 7	: Division Approved	District	Approved	
办,	Well Name/Num:	1	tett [3/23/99	
	API Num: (30-) 025-3	34577 County:	Lea	Date Spudded	<u> </u>	
-0 \ Z	Footages 650 FUL	1	ec <u>9</u> Tsp235	- 5 Rag 34E 1	2000	
	Operator Name:	-			CONVES LACK)))
13+	Su TE 500 20 Operator Address: 20	N. Brokan	AY OKC	OK 73 1	Inj. Tubing Size:	Yz,
•	Current Status of Well: Page 1		ned Warls Place	POCK Pool	Ini. Tuhing Size	5000
	Current Status of Well. 124	Hole/Pipe Sizes	Depths	Cement	Top/Method	
	Surface	- 19	730	1525 SX	CIRC	
	Intermediate	17/2 1338	2265 5012	1260 SX	CIRC 1400 TES.	
	Production	8/2 7"	11,800	1250	3750 T.S.	
	Last DV Tool		,	/		
	Open Hole/Liner					_
	Plug Back Depth					
	Diagrams Included (Y/N): E Checks (Y/N): We		After ConversionELogs in Imaging		7 Mosime 150	7
	Intervals:	Depths	Formation	Producing (Yes/No)	7 Mosima 1870	
	Saly Polash	14200	Rustler	BOTTOM	(3500-50	
	Capitan Reef	on e	oge of	Roof Or	a 7	
	Cliff House, Etc:		0 0	U	_	
, T.	Formation Above	A 3 .	- 20 -	No.	In- V	
546=3	Top Inj Interval	400	Bell C.	No	PSI Max. WHIP	
	Bottom Inj Interval	70E8 8494-8531	Charry C.	No Roop	Wo. Open Hole (Y/N)	
	O Formation Below	1 117-8-31	P-> /	Jan lok	Deviated Hole (Y/N)	
	Fresh Water: Depths: O	tion Zone (Y/N/NA) 💆 🗲	DispWaters (Y/N/I	NA)Types: _D	Affirmative Statement 199	
	Notice: Newspaper(Y/N)				sim/slo	
	Other Affected Parties:	IPOK Hayes	K-F, SWEN, C	70P		
	AOR/Repairs: NumActiveV	A .	•	•	11	_
	AOR Num of P&A Wells	Repairs? No D		/	RBDMS Updated (Y/N)	
	Well Table Adequate (Y/N)	AOR STRs:	_	spRge	UIC Form Completed (Y/N)	_
	New AOR Table Filename			spRge	This Form completed 100	-7
	Conditions of Approval:	200 20	SecT:	spRge	Data Request Sent 410/67	
	Reaf Prote	reteon?	estally/La	eterally?		
	AOR Required Work:	Swa	Brost	Bollo	= 3	
	Required Work to this We	ll: <u> </u>	10000 2	P160 = ?		_

Inactive Well List

Total Well Count:1689 Inactive Well Count:1 Since:1/15/2006
Printed On: Tuesday, April 10 2007

District	API	Well	ULSTR	OCD Unit	OGRID	Operator	Lease Type	Well Type	Last Production	Formation/Notes Sta	Days tus in TA
2	30-015-23753	CATCLAW DRAW UNIT COM #016	E-13-21S-25E	E	6137	DEVON ENERGY PRODUCTION COMPANY, LP	S	G	09/2005	MORROW	

WHERE Ogrid:6137, County:All, District:All, Township:All, Range:All, Section:All, Production(months):15

INSTRUCTIONS

This form is to be filed with the appropriate District Office of the Division not later than 20 days after the completion of arty newly-drilled or deepened well. It shall be accompanied by one copy of all electrical and radio-activity logs run on the well and a summary of all special tests conducted, including drill stem tests. All depths reported shall be measured depths. In the case of directionally drilled wells, true vertical depths shall also be reported. For multiple completions, items 25 through 29 shall be reported for each zone. The form is to be filed in quintuplicate except on state land, where six copies are required. See Rule 1105.

INDICATE FORMATION TOPS IN CONFORMANCE WITH GEOGRAPHICAL SECTION OF STATE

		Southeast	ern New Mexico	Northwestern New Mexico							
T. Lam	ar – 4966	5	T. Atoka	T. Ojo Ala	imo		T. Penn. "B"				
T. Bell	Canyon	4988 1	TStrawn_	T. Kirtlan	l-Fruitl	and	T. Penn. "C"				
				T. Picture	d Cliffs		T. Penn. "D"				
T. Brus	hy Cany	on – 7546	T. Miss	T. Cliff H	ouse		I. Leadville				
	Spring		T. Devonian	T. Menefe	e		T. Madison				
· ·		**		T. Point L	ookout		T. Elbert				
T. Mon	row Clas	tics - 12946	. I. Montoya	T. Mancos	·		T. McCracken				
T. San A	Andres		T. Simpson	T. Gallup_			T. Ignacio Otzte				
T. Glori	eta		T. McKee	Base Gree	nhorn		T. Granite				
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	,	/					OIL OR GAS				
							SANDS OR ZONES				
No. 1. 1	from		to	No. 3, f	rom		to				
No 2	from		to	No 4 f	rom		to				
110. 2,			IMPORTANT	MATER	AND	2					
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			r inflow and elevation to which wa			a .					
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No. 2, 1	${f from}\dots$		to			feet					
No. 3, 1	${f from}$		to			feet					
		T.	ITHOLOGY RECORD	(Attach add	litiona	l sheet if ne	ecessary)				
		Thickness		7		Thickness					
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Submit 3 Copies to Appropriate District Office

State of New Mexico Energy, Minerals and Natural Resources Department

Form C-103 Revised 1-1-89

Revised 1-1-89

DISTRICT 1	OIL CONSERVATION	ON DIVISION					
P.O. Box 1980, Hobbs, NM 88240	2040 Pacheco St.		WELL API NO. 30025-34577				
DISTRICT II P.O. Drawer DD, Artesia, NM 88210	Santa Fe, NM 8	Indicate Type of Lea					
DISTRICT III			STATE FEE				
DISTRICT III 1000 Rio Brazos Rd., Aztec, NM 87410			₅State Oil & Gas Lea	se No.			
SUNDRY NO	TICES AND REPORTS ON WEI	LLS	¥.	6878-1017 (1910) 111 (1910) (19			
DIFFERENT RESE	OPOSALS TO DRILL OR TO DEEPEN RVOIR. USE "APPLICATION FOR PE	RMIT"	Lease Name or Unit	•			
L	C-101) FOR SUCH PROPOSALS.)		1	//·C			
1Type of Well: OIL GAS WELL WELL	OTHER						
2Name of Operator CONCHO RESOURCES INC.			₄Well No. 1				
Address of Operator 110 W LOUISIANA STE 410; MID	DLAND TX 79701		Pool name or Wildo NORTH BELL L	at .AKE MORROW			
Well Location Unit Letter E : 1650	Feet From The NORTH	Line and 660	Feet From The	WEST Line			
Section 9	222	Range 34E	NMPM	LEA County			
Project Artist Control of the Contro	10Elevation (Show whether DF,						
11 Check A	3419	eture of Nation De	and an Other I				
	Appropriate Box to Indicate No NTENTION TO:		port, or Other t SEQUENT RE				
NOTICE OF II		306	SEQUENT RE	PURIUF:			
PERFORM REMEDIAL WORK	PLUG AND ABANDON	REMEDIAL WORK	ᆜ	ALTERING CASING			
TEMPORARILY ABANDON	CHANGE PLANS	COMMENCE DRILLING O	PNS.	PLUG AND ANBANDONMENT			
PULL OR ALTER CASING		CASING TEST AND CEM	ENT JOB				
OTHER:		OTHER: RIH & SET II	NTERMEDIATE C	sg 🔀			
12Describe Proposed or Completed Operation	ons (Clearly state all pertinent details, and giv	e pertinent dates, including es	stimated date of starting	any proposed			
4-22-99 RIH & SET 7", 23#, LTC I	NTERMEDIATE CSG @ 11800' , CN	IT W/ 550 SX INTERFIL	L "H" + 1/4# FLOC	ELE TAILED W/ 700 SX			
50/50 POZ H + 2% GEL +.4% HA	LAD 322 + 2% HALAD 344. PLUG [DOWN @ 6:45 PM CST	4/22/99. TOC @ 3	3750'.			
,							
I hereby certify that the compation above	strue and complete to the best of my knowle	dge and belief.	· 				
SIGNATURE	the	TLE PRODUCTION AN	ALYST	DATE 04-29-99			
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(This space for State Use)							
Uh		,		was to the			
APPROVED BY	Transfer and September 1	TLE		DATE			

Submit 3 Copies to Appropriate District Office

CONDITIONS OF APPROVAL, IF ANY:

State of New Mexico Energy, Minerals and Natural Resources Department

Form C-103 Revised 1-1-89

District Office OIL CONSERVATION DIVISION DISTRICT WELL API NO. P.O. Box 1980, Hobbs, NM 88240 2040 Pacheco St. 30025 34577 Santa Fe, NM 87505 DISTRICT II
P.O. Drawer DD, Artesia, NM 88210 sIndicate Type of Lease STATE FEE «State Oil & Gas Lease No. 1000 Rio Brazos Rd., Aztec, NM 87410 SUNDRY NOTICES AND REPORTS ON WELLS (DO NOT USE THIS FORM FOR PROPOSALS TO DRILL OR TO DEEPEN OR PLUG BACK TO A 7Lease Name or Unit Agreement Name DIFFERENT RESERVOIR. USE "APPLICATION FOR PERMIT" Caballo '9' State (FORM C-101) FOR SUCH PROPOSALS.) Type of Well: WELL 🛛 OTHER WELL «Well No. 2Name of Operator Concho Resources Inc. 1 Address of Operator Pool name or Wildcat 110 W. Louisiana, Ste 410; Midland, Tx 79701 North Bell Lake Morrow ₄Well Location 1650 Feet From The North 660 West Feet From The Unit Letter Line and Line Section 23S Range 34E Lea Township **NMPM** County 10 Elevation (Show whether DF, RKB, RT, GR, etc.) 3419 11 Check Appropriate Box to Indicate Nature of Notice, Report, or Other Data NOTICE OF INTENTION TO: SUBSEQUENT REPORT OF: PLUG AND ABANDON PERFORM REMEDIAL WORK REMEDIAL WORK ALTERING CASING TEMPORARILY ABANDON CHANGE PLANS COMMENCE DRILLING OPNS PLUG AND ANBANDONMENT **PULL OR ALTER CASING CASING TEST AND CEMENT JOB** OTHER: Run Int. Csg OTHER: 12Describe Proposed or Completed Operations (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work) SEE RULE 1103. 04-08-99 RIH & set 9-5/8" intermediate csg @ 5012' w/ 2000 sx Interfill C + additives and tailed w/ 250 sx Premium Plus w/ 2% CaCL + 1/4# flocele. Did not Circ. TOC @ 1400'.

THE Production Analyst

TITLE Production Analyst

DATE 04-15-99

TYPE OR PRINT NAME

THE PRODUCTION Analyst

TELEPHONE NO.

TITLE PRODUCTION Analyst

TELEPHONE NO.

TITLE PRODUCTION Analyst

TELEPHONE NO.

Submit 3 Copies to Appropriate District 6-Yice

CONDITIONS OF APPROVAL, IF ANY:

State of New Mexico Energy, Minerals and Natural Resources Department

Form C-103 Revised 1-1-89

<u>DISTRICT (</u> P.O. Box 1980, Hobbs, NM 88240	OIL CONSERV	WELL API NO. 30025-34577				
DISTRICT II P.O. Drawer DD, Artesia, NM 88210	Santa Fe, I	NIVI 07	505	sIndicate Type of Le	ase STATE	FEE
DISTRICT III 1000 Rio Brazos Rd., Aztec, NM 87410				•State Oil & Gas Le		100
(DO NOT USE THIS FORM FOR PRODIFFERENT RESERV	CES AND REPORTS ON POSALS TO DRILL OR TO DE VOIR. USE "APPLICATION FO 101) FOR SUCH PROPOSALS	EEPEN (OR PER	OR PLUG BACK TO A	7Lease Name or Un CABALLO '9' S	it Agreement Name	
Type of Well: OIL GAS WELL WELL	OTHER					
2Name of Operator CONCHO RESOURCES INC.				₃Well No. 1		
3Address of Operator 110 W LOUISIANA STE 410; MIDL	AND TX 79701			Pool name or Wild NORTH BELL	cat LAKE MORROW	
Well Location Unit Letter E : 1650	Feet From The NORT	Н	Line and660	Feet From The	WEST	Line
Section 9	Township 235	S F	Range 34E	NMPM	LEA	County
	₀Elevation (Show whe 3419	ther DF, I	RKB, RT, GR, etc.)			即於無機能
11 Check Ap	propriate Box to Indica	ate Na	ture of Notice, Re	port, or Other	Data	
NOTICE OF INT	TENTION TO:	i	SUB	SEQUENT R	EPORT OF:	
PERFORM REMEDIAL WORK	PLUG AND ABANDON		REMEDIAL WORK		ALTERING CASI	NG _
TEMPORARILY ABANDON	CHANGE PLANS		COMMENCE DRILLING	OPNS.	PLUG AND ANBA	NDONMENT [
PULL OR ALTER CASING			CASING TEST AND CEM	BOL TNB		
OTHER:			OTHER: SET DEEP	SURFACE CSG	······	⊠
12Describe Proposed or Completed Operations work) SEE RULE 1103. 3/31/99 RIH W/ 13-3/8", 61#, J55, B PLUS + ADDITIVIES. CIRC 268 SK	T&C CSG & SET @ 2265' V	,		•		ЕМІИМ
					•	
1 -	~ <u>`</u>					
I hereby certify that the information above is t	posend complete to the best of my	knowled	ge and belief.			
SIGNATURE	woun	TIT	PRODUCTION AN	ALYST	DATE 04-01-	99
TYPE OR PRINT-NAME TERRI STATHEM					TELEPHONE NO. 91	5-683-7443
(This space for State Use)					, A	
	TO BY CHILD WELLAME 	: TIT	LE		DATE	