

7

Seth C. McMillan Cell: (505) 986-2519

Email: smcmillan@montand.com
www.montand.com

ALL PURCOS TO POLICE

March 28, 2016

HAND-DELIVERED

Mr. David Catanach, Director NM Oil Conservation Division 1220 S. St. Francis Drive Santa Fe, NM 87501

Re: NMOCD Case No. 15442: Application of BC Operating, Inc. for Authorization to Inject, Eddy County, New Mexico

Dear Mr. Catanach:

Please be advised that BC Operating, Inc. has resolved the objection interposed by Devon Energy to the referenced SWD application. A copy of attorney Gary Larson's March 22, 2016 email indicating the withdrawal of Devon's objection is enclosed as Exhibit A to this letter.

Furthermore, please be advised that BC Operating has received and reviewed Anchor Helm's March 17, 2016 email on behalf of the State Land Office recommending changes to BC Operating's application. That email is enclosed herewith as Exhibit B. In response to the SLO's concerns, BC Operating has amended its C-108. BC Operating's amended C-108 is enclosed with this letter. For sake of reference, a courtesy copy of the original C-108 is also enclosed as Exhibit C.

Finally, a hearing is set for March 31, 2016 in this matter. In light of the above and enclosed, BC Operating asks that its Application for examiner hearing be dismissed and the matter referred back to the Engineering and Geological Services Bureau for administrative approval.

Mr. David Catanach March 28, 2016 Page 2

Very truly yours,

Seth C. McMillan J. Scott Hall

SCM:bw Encls.

cc Phillip Goetze, NMOCD Santa Fe BC Operating, Inc.

Seth McMillan

From: Gary Larson <glarson@hinklelawfirm.com>

Sent: Tuesday, March 22, 2016 10:18 AM

To: Jones, William V, EMNRD (William V. Jones@state.nm.us); Goetze, Phillip, EMNRD

(Phillip.Goetze@state.nm.us); McMillan, Michael, EMNRD (Michael.McMillan@state.nm.us); Brooks, David K, EMNRD

Cc: 'Davidson, Florene, EMNRD' (florene.davidson@state.nm.us); aholm@slo.state.nm.us;

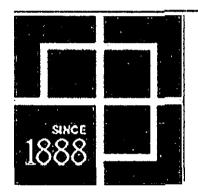
Seth McMillan

Subject: Case 15442

Gentlemen,

This is to notify you that Devon Energy Production Company L.P. is withdrawing its objection to BC Operating's application in Case 15442. I've previously informed Seth McMillan, counsel for BC Operating, of Devon's withdrawal of its objection to the application.

Gary



Gary W. Larson,
Partner
Hinkle Shanor LLP
218 Montezuma
Santa Fe, New Mexico 87501
(505) 982-4554 telephone
(505) 982-8623 facsimile
glarson@hinklelawfirm.com

This message (including attachments) constitutes a confidential attorney-client or is otherwise a confidential communication from the law firm, Hinkle Shanor LLP, that is covered by the Electronic Communications Privacy Act, 18 U.S.C. Sections 2510-2521, and is intended solely for the use of the individual(s) or entity to whom it is addressed. It is not intended for transmission to, or receipt by, any unauthorized person. If you are not the intended recipient or received these documents by mistake or error, please do not read it and immediately notify us by collect telephone call to (505) 982-4554 for instructions on its destruction or return. If you are not the intended recipient, you are hereby notified that any disclosure, copying, distribution, action or reliance upon the contents of the documents is strictly prohibited.



Seth McMillan

From:

J. Scott Hall

Sent:

Thursday, March 17, 2016 11:26 AM

To:

Seth McMillan

Subject:

FW: BC Operating - Grande State #1 SWD Proposed Plugback

From: Goetze, Phillip, EMNRD [mailto:Phillip.Goetze@state.nm.us]

Sent: Thursday, March 17, 2016 10:42 AM

To: Gary Larson (glarson@hinklelawfirm.com); J. Scott Hall

Cc: Jones, William V, EMNRD; McMillan, Michael, EMNRD; Davidson, Florene, EMNRD; Holm, Anchor E.; Brooks, David K,

EMNRD; Lowe, Leonard, EMNRD

Subject: FW: BC Operating - Grande State #1 SWD Proposed Plugback

RE: Case No. 15442; Submitted Statement of the State Land Office

Gentlemen:

The State Land Office has provided the following written comments assessing the latest C-108 application for this proposed disposal well. The SLO is not a protestant in this case, but is an "affected person" based on the original application filed for administrative review. OCD does consider these comments relevant and has made this document part of the case record. This notification is to provide your clients the opportunity to review SLO input for consideration in the upcoming case. Please contact me with any questions regarding this matter. PRG

Phillip R. Goetze, PG

Engineering and Geological Services Bureau
Oil Conservation Division
New Mexico Energy, Minerals and Natural Resources Department
1220 South St. Francis Drive
Santa Fe, NM 87505

Direct: 505.476.3466

e-mail: phillip.goetze@state.nm.us



From: Holm, Anchor [mailto:aholm@slo.state.nm.us]

Sent: Thursday, March 17, 2016 9:55 AM

To: Goetze, Phillip, EMNRD < Phillip.Goetze@state.nm.us>

Cc: Martin, Ed <emartin@slo.state.nm.us>; Warnell, Terry G. <twarnell@slo.state.nm.us>

Subject: BC Operating - Grande State #1 SWD Proposed Plugback

Phil,



Yesterday, I received the revised copy of the C-108 SWD Application for the Grande State #1 (30-015-31910) by BC Operating. Their Proposed SWD interval is from 2,780' to 4,900'. In this wellbore the bottom of salt was recorded at a depth of 2600', which must be protected from solution by disposed produced waters. Typically, a minimum buffer of at least 300 feet is desired by the State Land Office in order to protect the surface Trust Lands from potential subsidence caused by salt water disposal.

Therefore, the State Land Office recommends that the <u>top of injection</u> be lowered to a depth of <u>at least 2,900'.</u> Also, in the well located on the same lease about ½ mile east of the proposed SWD, the bottom of salt was reported at 2,775'. This suggests that a **top of injection of 3,075'** may be more prudent.

An <u>additional concern</u> is the construction of the Grande State #1 wellbore. It did not have the annulus outside the 7" casing cemented above 5,650'. The 9-7/8" surface casing was set at 2,768', only a short distance below the bottom of Salt reported in the subject wellbore. However, the offset well having a top of salt reported at 2,775', which is deeper than the surface casing setting depth in the Grande State #1 wellbore.

Therefore, the <u>State Land Office recommends</u> that the proposed cement squeeze of this annulus be modified from a target top of cement at a depth of 2,266' to a requirement to <u>circulate cement to surface</u>. The reasoning is that the cement job at the shoe of the surface casings in this area frequently do not fully protect the salt from being dissolved by SWD operations. By placing additional hydraulic head on the surface casing shoe during the squeeze cement job, the strength of the seal at the shoe will be significantly improved.

Respectfully,

Anchor E. Holm

Geoscientist/Petroleum Engineering Specialist
Oil Gas & Minerals Division
505.827.5759

New Mexico State Land Office
310 Old Santa Fe Trail
P.O. Box 1148

Santa Fe, NM 87504-1148

aholm@slo.state.nm.us
nmstatelands.org



CONFIDENTIALITY NOTICE - This e-mail transmission, including all documents, files, or previous e-mail messages attached hereto, may contain confidential and/or legally privileged information. If you are not the intended recipient, or a person responsible for delivering it to the intended recipient, you are hereby notified that you must not read this transmission and that any disclosure, copying, printing, distribution, or use of any of the information contained in and/or attached to this transmission is STRICTLY PROHIBITED. If you have received this transmission in error, please immediately notify the sender and delete the original transmission and its attachments without reading or saving in any manner. Thank you.

This email has been scanned by the Symantec Email Security.cloud service. For more information please visit http://www.symanteccloud.com

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

FORM C-108 Revised June 10, 2003

APPLICATION FOR AUTHORIZATION TO INJECT

J.	PURPOSE: Secondary Recovery Pressure Maintenance xxx Disposal Storage Application qualifies for administrative approval? xxx Yes No
II.	OPERATOR:NADEL AND GUSSMAN PERMIAN, LLC
	ADDRESS:601 N. MARIENFELD SUITE 508 MIDLAND TX 79701
	CONTACT PARTY:JASON GOSS PHONE:432-682-4429
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 XXX 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:
	 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: JASON GOSS TITLE: ENGINEER
	SIGNATURE:
*	E-MAIL ADDRESS: igoss@naguss.com If the information required under Sections VI, VIII, X, and XI above has been previously submitted, it need not be resubmitted. Places show the data and circumstances of the cooling submitted.
	Please show the date and circumstances of the earlier submittal:
DIST	RIBUTION: 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:	NADEL AND GUSSMAN PERMIAN, I	EEC.	· · · · · · · · · · · · · · · · · · ·	1 100 7 3			
WELL NAME & NUMB	ER: GRANDE STATE #1	API 30-015-31910_					
	660' FNL, 1980' FWL FOOTAGE LOCATION			23S	29E		
	FOOTAGE LOCATION	UNIT LETTER	SECTION	TOWNSHIP	RANGE		
	WELLBORE SCHEMATIC		WELL CONSTRUCTION DATA Surface Casing				
	400'	Cemented with:	7.5"sx.	Casing Size: 13	ft ³		
	400	☐ Top of Cement:	SURFACE		i: CIRCULATED		
	. 2768'	Cemented with:	Intermediat 5 1425 sx. SURFACE Production	Casing Size: 9-5	ft ³		
.5" 13.5# P110 liner, 6.15" hole emented to top of liner w/ 295 s irculated 55 sacks off of liner to 'op of liner is 10,277'	acks,	Cemented with: Top of Cement: Total Depth:SI		Casing Size: 5-1 or Method Determined interval	ft ³		
			PERFOR	ATED			

INJECTION WELL DATA SHEET

T	ubing Size:35", 93#T255 Lining Material: Internally plastic coated							
Тур	De of Packer: Weatherford Arrow Set 1X Injection Packer							
Pac	ker Setting Depth: 50ft above top perf							
Oth	ner Type of Tubing/Casing Seal (if applicable): NONE							
	Additional Data							
1.	Is this a new well drilled for injection? Yes XXX No							
	If no, for what purpose was the well originally drilled? <u>ATOKA GAS WELL, BONE SPRING OIL WELL,</u>							
	TD 12:500 VERTICAL WELL							
2.	Name of the Injection Formation: <u>DELAWARE GROUP-BELL CANYON</u>							
3.	Name of Field or Pool (if applicable): SWD BELL CANYON							
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.								
	YES. ATOKA 12,278' – 12,282'. PLUG BACK: CIBP SET AT 12,250 WITH 35' OF CEMENT. ATOKA PERFS: 12,122 – 12,140', PLUGGED BACK W/ 25 SACK PLUG AT 11,804 -12,154. SET PLUG AT LINER TOP 100 SACKS. BONE SPRINGS PERFS 7968-8052.							
5.	Give the name and depths of any oil or gas zones underlying or overlying the proposed injection zone in this area:							
	BELOW: DELAWARE 6500', BONE SPRING 1ST SAND 7600, BONE SPRING 2 ND SAND 7968, WOLFCAMP_10,970, ATOKA 12,122							
	ABOVE: NONE							

Grande State #1 - Proposed Conversion Procedure

Plan to plug back well to complete in Delaware as Injector pending NMOCD disposal approval.

- 1. Pull production tubing.
- 2. Wireline set CIBP at 7,868'and dump 35ft cement. Uppermost perf (2nd BS Sand 7,968-8052')
- 3. Shoot squeeze holes at 5600'. Set cement retainer at 5500' and squeeze cement into annulus with a minimum height of 2,000'.
- 4. Perforate Delaware 2780-4900' and stimulate for injection.
- 5. Set packer at 2730 with injection tubing and run OCD integrity test.

III. WELL DATA

- (1) Lease name; Well No.; Location by Section, Township and Range; and footage location within the section.

 Grande State #1, Sec. 32-T23S-R29E, 660' FNL & 1980' FWL, Eddy County, New Mexico
- (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.

Casing Size	Setting Depth	Sacks of Cement	Hole Size	Top of Cement	Determined
13-3/8"	400'	375	17-1/2"	Surface	Circulate
9-5/8"	2,768'	1,425	12-1/4"	Surface	Circulate
7"	10,277	1,193	8-3/4"	5,650′	CBL
4.5"	10,277-12,500	295	6-1/8"	10,277	Circ. off liner top

(3) A description of the tubing to be used including its size, lining material, and setting depth.

3-1/2" OD, Internally Plastic Coated Tubing set @ 2750' 3280

(4) The name, model, and setting depth of the packer used or a description of any other seal system or assembly used.

Weatherford Arrow set 1X injection packer, nickel plated with on/off tool Set within 50-100 feet above top Delaware perforations

- 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.

Delaware - Bell Canyon to Upper Cherry Canyon

Pool Name: SWD (Bell Canyon)

(2) The injection interval and whether it is perforated or open-hole.

2,780' to 4,980' (Perforated) 3380' 4400'

(3) State if the well was drilled for injection or, if not, the original purpose of the well.

The well was originally drilled as an Atoka gas 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.

Atoka Perfs, 12,278' - 12,282', plugged back, CIBP set at 12,250' with 35' of Cement

Atoka perfs, 12,122'-12,410', 25 sack plug at 11,804 - 12,154'

Bone Spring Perfs: 7968-8052

(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.

Next Higher: None / Next Lower: Delaware 6,450'