

District I  
1625 N. French Drive, Hobbs, NM 88240

District II  
1301 W. Grand Avenue, Artesia, NM 88210

District III  
1000 Rio Brazos Road, Aztec, NM 87410

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

RECEIVED

JUN 23 2005

OIL CONSERVATION  
DIVISION

APPLICATION FOR DOWNHOLE COMMINGLING

State of New Mexico

Energy, Minerals and Natural Resources Department

Oil Conservation Division

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

Form C-107A

Revised May 15, 2000

APPLICATION TYPE

Single Well

Establish Pre-Approved Pools

EXISTING WELLBORE

X Yes No

DHC-3493

Caulkins Oil Company

1409 W. Aztec, Blvd., Suite B7, Aztec NM 87410

Operator

Address

BREECH "D"

685-E

UNIT P - SEC. 11-26N-6W

Rio Arriba

Lease

Well No.

Unit Letter-Section-Township-Range

County

OGRID No. 003824 Property Code 2458 API No. 30-039-22911 Lease Type: X Federal State Fee

DATA ELEMENT	UPPER ZONE	INTERMEDIATE ZONE	LOWER ZONE
Pool Name	Mesa Verde ✓	South Blanco Tocito	Basin Dakota ✓
Pool Code	72319 ✓	06460 ✓	71599 ✓
Top and Bottom of Pay Section (Perforated or Open-Hole Interval)	5090' - 5430'	6748' - 6736'	7260' - 7470'
Method of Production (Flowing or Artificial Lift)	Flowing	Flowing	Flowing
Bottomhole Pressure (Note: Pressure data will not be required if the bottom perforation in the lower zone is within 150% of the depth of the top perforation in the upper zone)			
Oil Gravity or Gas BTU (Degree API or Gas BTU)	1211	Estimated: 1286	1211
Producing, Shut-In or New Zone	New Zone	Producing	Producing
Date and Oil/Gas/Water Rates of Last Production. (Note: For new zones with no production history, applicant shall be required to attach production estimates and supporting data.)	Date: 12 month average  Rate: Gas Oil Water 8 .227 .041 MCF/D Bbl Bbl	Date: Estimated  Rate: Gas Oil Water 175 4 .10 MCF/D Bbl Bbl	Date: 12 month average  Rate: Gas Oil Water 109 .558 .085 MCF/D Bbl Bbl
Fixed Allocation Percentage (Note: If allocation is based upon something other than current or past production, supporting data or explanation will be required.)	Oil Gas 6 % 3 %	Oil Gas 83 % 60 %	Oil Gas 11 % 37 %

#### ADDITIONAL DATA

Are all working, royalty and overriding royalty interests identical in all commingled zones? Yes X No

If not, have all working, royalty and overriding royalty interest owners been notified by certified mail? Yes No

Are all produced fluids from all commingled zones compatible with each other? Yes X No

Will commingling decrease the value of production? Yes No X

If this well is on, or communitized with, state or federal lands, has either the Commissioner of Public Lands or the United States Bureau of Land Management been notified in writing of this application? Yes No

NMOCD Reference Case No. applicable to this well: DHC-1868-A, DHC-2069-A, DHC - 3187, DHC-2248, DHC-2102

#### Attachments:

- C-102 for each zone to be commingled showing its spacing unit and acreage dedication.
- Production curve for each zone for at least one year. (If not available, attach explanation.)
- For zones with no production history, estimated production rates and supporting data.
- Data to support allocation method or formula.
- Notification list of working, royalty and overriding royalty interests for uncommon interest cases.
- Any additional statements, data or documents required to support commingling.

#### PRE-APPROVED POOLS

If application is to establish Pre-Approved Pools, the following additional information will be required:

- List of other orders approving downhole commingling within the proposed Pre-Approved Pools
- List of all operators within the proposed Pre-Approved Pools
- Proof that all operators within the proposed Pre-Approved Pools were provided notice of this application.
- Bottomhole pressure data.

I hereby certify that the information above is true and complete to the best of my knowledge and belief.

SIGNATURE Robert L. Verquer TITLE Superintendent DATE June 15, 2005  
TYPE OR PRINT NAME Robert L. Verquer TELEPHONE NO. (505) 334-4323

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT

**SUNDRY NOTICES AND REPORTS ON WELLS**

(Do not use this form for proposals to drill or to deepen or plug back to a different reservoir. Use "APPLICATION FOR PERMIT--" for such proposals)

5. Lease

NMNM-03553

6. If Indian, Allottee or Tribe Name

7. Unit Agreement Name

1. Oil Well ☐ Gas Well ☐ Other ☐  
GAS WELL

8. Well Name and No.

BREECH "D" 685-E

2. Name of Operator:

**Caulkins Oil Company**

9. API Well No.

30-039-22911-00C1

3. Address of Operator:

**(505) 334-4323**

**1409 W. Aztec Blvd. Ste B7, Aztec, NM 87410**

10. Field and Pool, Exploratory Area

DAKOTA, MESA VERDE

4. Location of Well (Footage, Sec., Twp., Rge.)

858' F/S 927' F/E

SEC. 11-26N-6W

11. Country or Parish, State

Rio Arriba Co., New Mexico

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

TYPE OF SUBMISSION	TYPE OF ACTION
<input checked="" type="checkbox"/> Notice of Intent	<input type="checkbox"/> Abandonment <input type="checkbox"/> Change of Plans
<input type="checkbox"/> Subsequent Report	<input checked="" type="checkbox"/> Recompletion <input type="checkbox"/> New Construction
<input type="checkbox"/> Final Abandonment Notice	<input type="checkbox"/> Plugging Back <input type="checkbox"/> Non-Routine Fracturing
	<input type="checkbox"/> Casing Repair <input type="checkbox"/> Water Shut-Off
	<input type="checkbox"/> Altering Casing <input type="checkbox"/> Conversion to Injection
	<input checked="" type="checkbox"/> Other <u>Downhole Commingle</u> <input type="checkbox"/> Dispose Water

17. Describe Proposed or Completed Operations:

5-13-05

We request approval to recomplete this well in the South Blanco Tocito formation by the following procedure:

Rig up. T. O. H. standing back 2 3/8" tubing with R-3 packer.

Run wireline set retrievable bridge plug to 7000'.

Run gas spectrum log through Tocito & Gallup formations, 6800' to 6400'.

Perforate Tocito zone, 6748' to 6736' with 4 shots per foot.

T. I. H. with 2 7/8" tubing with fullbore packer to approximately 6000'.

Frac Tocito zone with 20,000# 20/40 sand and N2 foam.

Flow well back to clean up and test.

T. O. H. laying down 2 7/8" tubing with packer.

T. I. H. with 2 3/8" tubing with retrieving head.

T. O. H. with retrievable bridge plug from 7000'.

T. I. H. with 2 3/8" production tubing.

Clean out to PBTD with air foam unit.

Land tubing on doughnut at approximately 7340'.

Commingle Dakota - Tocito - Mesa Verde.

Rig down and move.

NOTE: The format is issued in lieu of U.S. BLM Form 3160-5

18. I HEREBY CERTIFY THE FOREGOING IS TRUE AND CORRECT

SIGNED: Robert L. Verquer TITLE: Superintendent DATE: May 13, 2005  
**ROBERT L. VERQUER**

APPROVED BY: \_\_\_\_\_ TITLE: \_\_\_\_\_ DATE: \_\_\_\_\_  
CONDITIONS OF APPROVAL, IF ANY

**LAST 12-MONTHS PRODUCTION  
FOR  
BREECH D 685-E**

**DAKOTA**

<b>MONTH</b>	<b>GAS</b>	<b>OIL</b>	<b>WATER</b>	<b>DAYS</b>	<b>GAS DPA</b>	<b>OIL DPA</b>
04/04	3,486	13	2	30	111	0.433
05/04	3,795	18	3	31	117	0.581
06/04	3,712	15	2	30	118	0.500
07/04	4,067	27	4	31	126	0.871
08/04	3,940	18	3	31	122	0.581
09/04	2,716	13	2	30	85	0.433
11/04	3,983	18	3	30	127	0.600
12/04	3,756	19	3	31	116	0.613
01/05	3,400	16	2	31	104	0.516
02/05	3,340	21	3	28	114	0.750
03/05	3,104	15	2	31	95	0.484
04/05	2,513	10	2	30	78	0.333
	<b>41,812</b>	<b>203</b>	<b>31</b>		<b>109</b>	<b>0.558</b>

**MESA VERDE**

<b>MONTH</b>	<b>GAS</b>	<b>OIL</b>	<b>WATER</b>	<b>DAYS</b>	<b>GAS DPA</b>	<b>OIL DPA</b>
04/04	330	6	1	30	8	0.200
05/04	356	9	1	31	9	0.290
06/04	347	8	1	30	9	0.267
07/04	376	13	2	31	9	0.419
08/04	367	9	1	31	9	0.290
09/04	272	7	1	30	6	0.233
11/04	368	8	1	30	10	0.267
12/04	353	10	2	31	9	0.323
01/05	326	8	1	31	8	0.258
02/05	315	10	2	28	9	0.357
03/05	304	8	1	31	7	0.258
04/05	257	5	1	30	6	0.167
	<b>3,971</b>	<b>101</b>	<b>15</b>		<b>8</b>	<b>0.277</b>

District I

State of New Mexico

Form C-102

PO Box 1980, Hobbs, NM 88241-1980

Energy, Minerals &amp; Natural Resources Department

Revised October 18, 1994

District II

Instructions on back

811 South First, Artesia, NM 88210

## OIL CONSERVATION DIVISION

Submit to Appropriate District Office

District III

1220 South St. Francis Drive

State Lease - 4 Copies

1000 Rio Brazos Rd., Aztec, NM 87410

Santa Fe, NM 87504

Fee Lease - 3 Copies

District IV

2040 South Pacheco, Santa Fe, NM 87505

☐ AMENDED REPORT

## WELL LOCATION AND ACREAGE DEDICATION PLAT

<sup>1</sup> API Number <b>30-039-22911</b>		<sup>2</sup> Pool Code <b>72319</b>		<sup>3</sup> Pool Name <b>MESA VERDE</b>	
<sup>4</sup> Property Code <b>2458</b>		<sup>5</sup> Property Name <b>BREECH "D"</b>			<sup>6</sup> Well Number <b>685-E</b>
<sup>7</sup> OGRID No. <b>003824</b>		<sup>8</sup> Operator Name <b>Caulkins Oil Company</b>			<sup>9</sup> Elevation <b>6529 GR</b>

<sup>10</sup> Surface Location

UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
P	11	26N	6W		858'	South	927'	East	Rio Arriba

<sup>11</sup> Bottom Hole Location If Different From Surface

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

<sup>12</sup> Dedicated Acres <b>320</b>	<sup>13</sup> Joint or Infill	<sup>14</sup> Consolidation Code	<sup>15</sup> Order No.
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NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED OR A NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION



					<sup>17</sup> OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief	
					Signature	
					Printed Name <b>Robert L. Verquer</b>	
					Title <b>Superintendent</b> Date <b>May 20, 2005</b>	
<sup>18</sup> SURVEYOR CERTIFICATION I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my knowledge and belief. Date of Survey					Signature and Seal of Professional Surveyor:	
					Certificate Number	

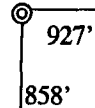
**2040 South Pacheco, Santa Fe, NM 87505**

**Santa Fe, NM 87504**

**Fee Lease - 3 Copies**

☐ AMENDED REPORT

				<b>17 OPERATOR CERTIFICATION</b> I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief	
				 Signature	
				Printed Name    Robert L. Verquer	
				Title                    Superintendent	
				Date                    May 20, 2005	
<div>Breach D 685</div> <div></div>				<b>18 SURVEYOR CERTIFICATION</b>	
				I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my knowledge and belief.	
				Date of Survey	
				Signature and Seal of Professional Surveyor:	
				Certificate Number	

				<div></div>	

District I

State of New Mexico

Form C-102

PO Box 1980, Hobbs, NM 88241-1980

Energy, Minerals &amp; Natural Resources Department

Revised October 18, 1994

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Instructions on back

811 South First, Artesia, NM 88210

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1000 Rio Brazos Rd., Aztec, NM 87410

Santa Fe, NM 87504

Fee Lease - 3 Copies

District IV

2040 South Pacheco, Santa Fe, NM 87505

☐ AMENDED REPORT

## WELL LOCATION AND ACREAGE DEDICATION PLAT

<sup>1</sup> API Number <b>30-039-22911</b>		<sup>2</sup> Pool Code <b>71599</b>		<sup>3</sup> Pool Name <b>BASIN DAKOTA</b>	
<sup>4</sup> Property Code <b>2458</b>		<sup>5</sup> Property Name <b>BREECH "D"</b>			<sup>6</sup> Well Number <b>685-E</b>
<sup>7</sup> OGRID No. <b>003824</b>		<sup>8</sup> Operator Name <b>Caulkins Oil Company</b>			<sup>9</sup> Elevation <b>6529 GR</b>

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				Signature	
				Printed Name <b>Robert L. Verquer</b>	
				Title <b>Superintendent</b> Date <b>May 20, 2005</b>	
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				Certificate Number	

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.

Print or Type Name

Signature

Title

Date

e-mail Address