. 4/2 DATE IN	9/98	SUSPENSE 5/19/98 ENGINEER DC LOGGED BY KW TYPE DHC						
		ABOVE THIS LINE FOR DIVISION USE ONLY						
NEW MEXICO OIL CONSERVATION DIVISION - Engineering Bureau -								
ADMINISTRATIVE APPLICATION COVERSHEET								
	THIS COVERSH	EET IS MANDATORY FOR ALL ADMINISTRATIVE APPLICATIONS FOR EXCEPTIONS TO DIVISION RULES AND REGULATIONS						
Application	[DHC-Do [PC-l	[NSP-Non-Standard Proration Unit] [NSL-Non-Standard Location] [DD-Directional Drilling] [SD-Simultaneous Dedication] wwnhole Commingling] [CTB-Lease Commingling] [PLC-Pool/Lease Commingling] 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] ualified Enhanced Oil Recovery Certification] [PPR-Positive Production Response]						
[1] <b>TY</b>	PE OF AI [A]	PLICATION - Check Those Which Apply for [A] Location - Spacing Unit - Directional Drilling NSL NSP DD SD APR 29 1993						
	Check [B]	One Only for [B] and [C]       Description         Commingling - Storage - Measurement       Description         DHC       CTB       PLC       PC         OLS       OLM						
	[C]	Injection - Disposal - Pressure Increase - Enhanced Oil Recovery						
[2] N	OTIFICAT [A]	TION REQUIRED TO: - Check Those Which Apply, or Does Not Apply 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,						
	<b>[F]</b>	U Waivers are Attached						

INFORMATION / DATA SUBMITTED IS COMPLETE - Statement of Understanding [3]

I hereby certify that I, or personnel under my supervision, have read and complied with all applicable Rules and Regulations of the Oil Conservation Division. Further, I assert that the attached application for administrative approval is accurate and complete to the best of my knowledge and where applicable, verify that all interest (WI, RI, ORRI) is common. I understand that any omission of data, information or notification is cause to have the application package returned with no action taken.

Note: Statement must be completed by an individual with supervisory capacity.

Kuy Maddex

Title Regulatory Agent

Kay Maddox Print or Type Name

## DISTRICT I

PO Box 1980, Hobbs, NM 88241 1980

SITRICT II 811 South! First St. Artesia NM 88210 2835

DISTRICT III

1000 Rio Brazos Rd. Aztec, NM 87410 1693

## State of New Mexico Energy, Minerals and Natural Rasources Department OIL CONSERVATION DIVISION

Form C-107-A New 3-12-96

APPROVAL PROCESS: Administrative 🗌 Hearing

APPLICATION FOR DOWNHOLE COMMINGLING

2040 S. Pacheco Santa Fe, New Mexico 87505-6429

EXISTING WELLBORE VES NO

Conoco Inc. Operate

Jicarilla E

Lease

10 Desta Dr. Ste 100W, Midland, Tx. 79705-4500 Add

Section 16, T-26-N, R-4-W, G #9M Unit Ltr Sec Two Rae Wéll No

Rio Arriba Count

Spacing Unit Lease Types: (check 1 or more)

005073 OGRID NO. - Property Code API NO. Federal 🛛 , State 🔲 (and/or) Fee

The following facts ate submitted in support of downhole comminging:	Upper Zone	intermediate Zone	Lower Zone	
1. Pool Name and Pool Code	Blanco Mesaverde 72319		Basin Dakota 71599	
2. TOP and Bottom of Pay Section (Perforations)	5570-6038'		7625-7854'	
3. Type of production (Oil or Gas)	Gas		Gas	
4. Method of Production {Flowing or Artificial Lilt}	To Flow		To Flow	
5. Bottomhole Pressure Oil Zones - Artilicial Lift: Estimated Current	a (Current) 554	a.	a. 1092	
Gas & Oil - Flowing: Measured Current All Gas Zones: Estimated Or Measured Original	b(Original)	b.	b. 2635	
6. Oil Gravity (°API) or Gas BT Content	1280		1332	
7. Producing or Shut-In?	To be Completed		To be Completed	
Production Marginal? (yes or no)	Yes (expected)		Yes (expected)	
<ul> <li>If Shut-In give date and oil/gas/ water rates of Isst production</li> <li>Note For new zones with no production hiStory applicant shad be required to attach production</li> </ul>	Date Rates	Date Rates:	Date Rates	
estimates and supporting dara • If Producing, date and oil/gas/ water rates of recent test (within 60 days)	Anticipated 1st Yr Rates Average 183 MCFD, 1.4 BOPD	Dale Rates	Date Anticipated 1st Yr Rates Average 268 MCFD, 4.5 BOPD	
8. Fixed Percentage Allocation Formula -% or each zone	oil Gas %	oil: Gas %	oit: Gas %	

9. If allocation formula is based upon something other than current or past production, or is based upon some other method, submit attachments with supporting data and/or explaining method and providing rate projections or other required data.

. Are all working, overriding, and royalty interests identical in all commingled zones? If not, have all working, overriding, and royalty interests been notified by certified mail? Have all offset operators been given written notice of the proposed downhole commingling?

 $\frac{X}{X} \frac{Yes}{Yes} - \frac{No}{No} \frac{No}{No}$ 

No If yes, are fluids compatible, will the formations not be damaged, will any cross-11. Will cross-flow occur? X Yes flowed production be recovered, and will the allocation formula be reliable. X Yes No (If No, attach explanation)

ORDER NO(S).

X Yes No 12. Are all produced fluids from all commingled zones compatible with each others

13. Will the value of production be decreased by commingling? Yes X No (If Yes, attach explanation)

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

15. NMOCD Reference Cases for Rule 303(D) Exceptions:

16. 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 all offset operators.

Notification list of all offset operators. Notification list of working, overriding and royalty interests for uncommon interest cases. Any additional statements, data, or documents required to support commingling.

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

SIGNATURE	Park	Madder
	1 7	

TYPE OR PRINT NAME Kay Maddox

DATE 4

TELEPHONE NO. (915)

686-5798

## APPLICATION FOR DOWNHOLE COMMINGLING Jicarilla E 9M, Unit Letter G, Section 16-T26N-R4W Rio Arriba County, New Mexico

As shown in the attached production plot for offsets to the Jicarilla E 9M, estimated ultimate recoveries and initial production rates from infill wells to the Dakota and Mesaverde formations are clearly marginal in this area. Mesaverde estimated recoveries in particular do not justify drilling stand alone wells (549 MMCF recovery in 20 years, 777 MMCF ultimate recovery). Futhermore, production plots from each zone indicate a similar decline profile and a fixed allocation formula can be utilized. Upon completion, both zones will be tested and stabilized flow rates will be used to allocate production from each zone. This procedure is common practice in Conoco's 28-7 Unit and reference is made to Order R-10476-B as it applies to downhole commingling of marginal zones and the allocation of production between such zones.

NORMALIZED AVG & EXPECTED AVG. NEW COMPLETION RATES: MCFD 0.0077 bbl/mcf oil yield 549 MMCF IN 20 YR 777 MMCF EUR 1000 20 MCFD E.L. 100 5 0 24 AND THE REAL PROPERTY OF THE R ➡ WELLS ON PRODUCTION --- FIT MCFD 4.0% FINAL DECLINE 60% DECLINE, 1ST 12 MONTHS **15% DECLINE, NEXT 12 MONTHS** 280 MCFD IP 48 72 41 WELLS SINCE 1980; TOWNSHIP 26N RANGE 4W A DESCRIPTION OF A DESC NORMALIZED MESAVERDE PRODUCTION 96 ł H NORMALIZED MCFD FIT CUM MMCF Real Property of the property MONTHS **JICARILLA E** JICARILLA E **JICARILLA A** RECENT WELLS IN 26N 04W (1993 AND NEWER) JICARILLA E 120 8M ಚ ø ZE 144 A NORM CUM MMCF 7 RECENT CONOCO WELLS 15K-26-4W 15B-26N-4W 13E-26N-4W 16B-26N-4W WILL AND A DECIMANT 168 **JICARILLA B** JICARILLA A JICARILLA E 192 G 216 9A 5 10E 26D-26N-4W 230-26N-4W 22B-26N-4W 240

.

04/17/98 11:37 AM 1 264MV97A.WK4 \

PREPARED BY: PDB

NORMALIZED AVG AND EXPECTED NEW COMPLETION AVG: 0.0167 bbl/mcf oil yield MCFD 1221 MMCF EUR 804 MMCF IN 20 YRS 20 MCFD E.L. 1000 100 10 0 24 Charles and a starting of the  $\Rightarrow$ - FIT MCFD WELLS ON PRODUCTION 48 60% DECLINE, 1ST 12 MONTHS **15% DECLINE, NEXT 12 MONTHS** 410 MCFD IP **4% FINAL DECLINE** 39 WELLS SINCE 1980; 26N-4W (MERIT JICARILLA A, B, & E OFFSETS) Concerned of the second of the 2 NORMALIZED DAKOTA PRODUCTION NORMALIZED MCFD 1 ട്ര FIT CUM MMCF 120 MONTHS 144 **JICARILLA E 7E JICARILLA E 8M RECENT WELLS (1993 AND NEWER):** A NORM CUM MMCF **JICARILLA E 7E & 8M** 168 15K-26N-4W 15B-26N-4W 192 216 240 .

04/17/98 11:36 AM 1 264DKNO2.WK4

PREPARED BY: PDB

former and a second s		TED STATES	SUBMITIN TRI Other instruc reverse sig	ionson	FORM APPR OMB NO. 10 Expires February	04-0136	
		T OF THE INTER		Γ	1 LEASE DSIGNATION A	ND SERIAL NO	
	BUREAU OF	LAND MANAGEME	NT		CONT 104		
APPL		9 IF INDIAN, ALLOTTEE OR TRIBE NAME					
1a. TYPE OF WORK		JICARILLA					
	eilt 🛛	DEEPEN			7 UNIT AGRREEMENT NA	ME	
	GAS WELL OTHER			· 「 」	8 FARM OR LEASE NAME WEL	LNO	
2. NAME OF OPERATOR			2010		JICARILLA	E #9M	
	Conoco Inc.				9. API WELL NO		
a. ADDRESS AND TELEPHONE N	0						
	a Dr. Ste 430E, Midlar		915-686-5794	<u>ا</u> آ	10. FIELD AND POOL, OR WILDCAT		
4 LOCATION OF WE	LL (Report location clearly :		vith any State requirements *)		Blanco MV/Basin Dakota		
		1675' FNL & 184	5' FEL	ſ	11. SEC, T., R., M., OR B AND SURVEY OR AR	LK. EA	
At proposed prod. ze	one	1675' FNL & 184	5' EE1				
14 DISTANCE IN MILES	AND DIRECTION FROM NE				Sec. 16. T26N. R4W		
14. DISTANCE IN MILES	AND DIRECTION FROM NE	lest town ok rost offe	L		12 COUNTY OR PARISH	13. STATE	
5. DISTANCE FROM PRO	POSED*	1 16 NG	OF ACRES IN LEASE		Rio Arriba	NM	
	INE FT rlg. unit line, if Any)		OF ACKES IN LEASE	17. NO. OF ACRES ASSIGNED TO THIS WELL			
(A lso to nearest d 8. DISTANCE FROM PRO	rig. unit line, if Any)	10 PR	OPOSED DEPTH	1	320		
TO NEAREST WELL,	DRILLING, COMPLETED, HIS LEASE, FT,	19. FA					
	whether DF, RT, GR, etc.)	<u>_</u>	8159'	L	Rotary 22. Approx. date work will start*		
21. ELEVATIONS (SHOW W							
2 3		4/15/98					
		PROPOSED CASING AN	D CEMENTING PROGRAM	1			
SIZE OF HOLE	GRADE, SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT			
12-1/4"	K-55, 9-5/8"	36#	300'	160 sxs, circ.			
8-3/4"	K-55, 7"	23#	3883'	485 sxs,circ.			
6-1/4"	K-55, 4-1/2"	10.5#	7859	400 sxs. toc @ 3700'			

It is proposed to drill verical wellbore to be downhole commingled in the Blanco Mesaverde and Basin Dakota Pools following the acquisition of sufficient production test data for allocation purposes. A downhole commingling application will be filed with the BLM and NMOCD prior to commingling. A NOS was filed 10/31/97. This well will drilled and equipped according to the following attachments:

1. Well Location & Acerage Dedication Plat (C-102) and other associated plats.

2. Proposed Well Plan Outline.

3. Cementing Plan.

4. Blowout Preventer Hookup.

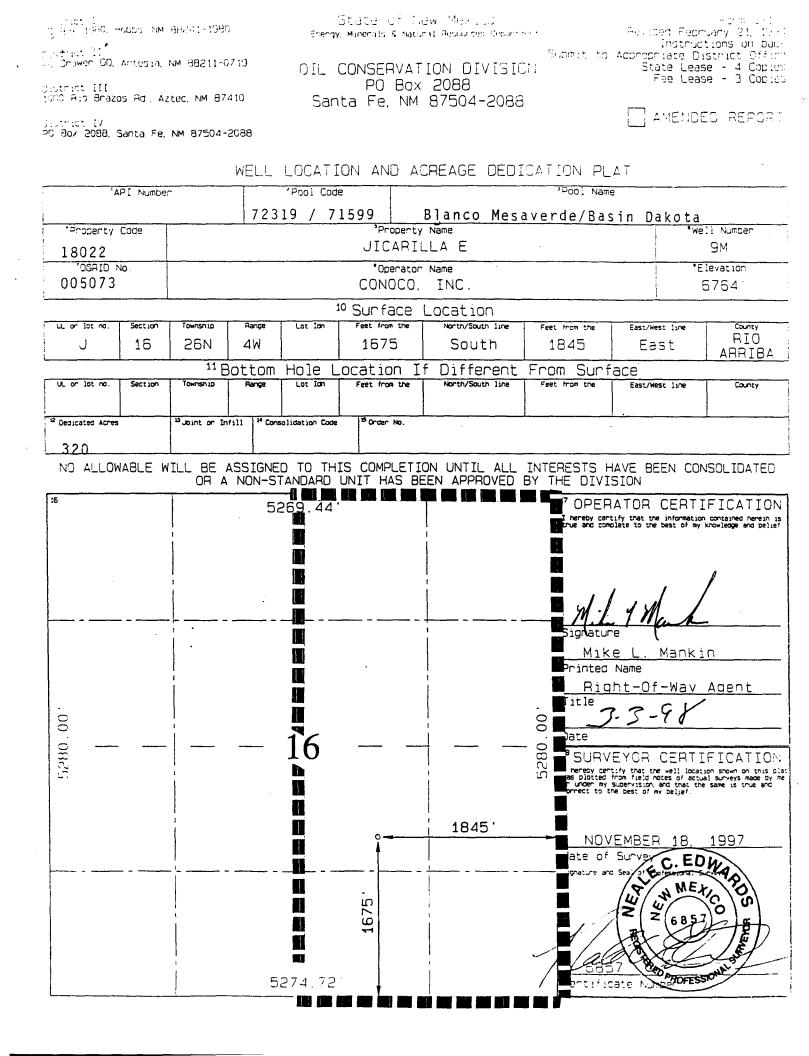
5. Surface Use Plan with Production Facility Layout.

6. Pipeline survey plat.

This application includes ROW's for the wellpad and access road.

IN ABOVE SPACE DESCRIBE PROPOSED PROGRAM: If proposal is to deepen give data on present productive zone and proposed new productive zone. If proposal is to drill or deepen directionally, give pertinent data on subsurface locations and measured and true vertical depths. Give blowout preventer program, if any. 24. Mike L. Mankin **Right-of-Way Agent** March 4, 1998 DATE (This space for Federal or State office use) APPROVAL DATE . PERMIT NO \_ Application approval does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon CONDITIONS OF APPROVAL, IF ANY: APPROVED BY TITLE . DATE \*See Instructions On Reverse Side

Title 18 U.S.C. Section 1001, makes it a crime for any person knowingly and willfully to make to any department or agency of the United States any faise, fictitious or fraudulent statements or representations as 16 any matter within its jurisdiction.



Jicarilla E # 9M Section 16, T-26-N, R-**\$**4W, Rio Arriba County, TX

RE: Application C-107A to Downhole Commingle

## **Notification of Offset Operators:**

Burlington Resources PO Box 4289 Farmington, NM 87499

Amoco PO Box 800 Denver, CO 80201

Chateau Oil & Gas 2515 McKinney Ave STE 840 Dallas, TX 75201

A copy of the C-107A has been sent to the above listed parties