State of New Mexico
OFFICE OF THE
Commissioner of Public Lands
Santa Fe

JIM BACA
COMMISSIONER

P.O. BOX 1148
SANTA FE, NEW MEXICO 87504-1148

CASE NO. 10418

December 30, 1991

Amoco Production Company
P. O. Box 800
Denver, Colorado 80201

Attn: Mr. J. W. Hawkins

Re: Application to Surface Commingle Condensate
San Juan 28-7 Unit
Rio Arriba County, New Mexico

Dear Mr. Hawkins:

Reference is made to your surface commingling application dated December 16, 1991, wherein you propose to surface commingle condensate production from the San Juan 28-7 Unit Well No. 102-N located on State Lease No. E-290-40. According to the information provided, this well is located in Section 2, Township 27 North, Range 7 West and is producing from both the Blanco-Mesaverde and Blanco-Pictured Cliffs pools and is the only state lease identified as a surface commingling candidate. Your application proposes to surface commingle condensate and water production from the PC separator and pipe it to an existing Mesaverde tank for collection and sales. Production into the tank will then be measured each month and allocated back to the individual well using an annual GOR test. It is our understanding that this well is already included within the Mesaverde and Pictured Cliffs participating areas and therefore are allocated production according to the participation formula in effect.

The Commissioner of Public Lands has this date granted approval to your proposed request. Please be advised than any deviation from your proposed request will be grounds to rescind our approval. Our approval is subject to like approval by the New Mexico Oil Conservation Division and the Bureau of Land Management.

If you have any questions, or if we can be of further help, please contact Pete Martinez at (505) 827-5791.

Very truly yours,

JIM BACA
COMMISSIONER OF PUBLIC LANDS

BY: Floyd Prando
FLOYD O. PRANDO, Director
Oil/Gas and Minerals Division
(505) 827-5744
JB/FOP/pm
encls.

OCD

Amoco Production Company

Southern Rockies Business Unit
Amoco Building
1670 Broadway
Post Office Box 800
Denver, Colorado 80201
303-830-4040

December 16, 1991

Jim Baca
New Mexico Commissioner of Public Lands
Oil/Gas and Minerals Division
P. O. Box 1148
Santa Fe, New Mexico 87504-1148

File: CAW-391-986.511

Application to Surface Commingle Condensate
San Juan 28-7 Unit
Rio Arriba County, New Mexico

Amoco Production Company hereby makes application to surface commingle condensate production from gas wells in the San Juan 28-7 Unit, Rio Arriba County, New Mexico. We have received your letter of November 19, 1991 regarding this application. The San Juan 28-7 Unit is a Federal Exploratory Unit consisting of four (4) participating areas. The State of New Mexico, by virtue of its mineral ownership in the participating areas receives royalty from the participating area production regardless of where the wells are located (i.e. on state lands or not). Pursuant to State Land Office Rule 1.055, the following information is provided:

A. Amoco's application is for permission to surface commingle condensate production from any dual wells or pairs of wells that are located in close proximity to each other within the San Juan 28-7 Unit. This will allow us to use an existing tank to collect the condensate from the dual well and avoid installation of a second tank at each wellsite. The gas production from each well will continue to be separately measured and will not be affected. Attached is the required application fee of thirty dollars ($30.00).

B. Attached is NMOCD Hearing Case 10418 Exhibit No. 1, a plat showing the unit boundary and the four participating areas shaded in different colors.

C. Attached is a portion of Exhibit "B" for the San Juan 28-7 Unit showing details of each of the state leases in the unit.

D. Attached is a listing of surface commingling candidate wells and the pool from which each well produces. San Juan 28-7 Unit Well No. 102 is currently the only well located on a state lease identified as a surface commingling candidate.

E. Attached is NMOCD Hearing Case 10418 Exhibit No. 3 showing simple economic analysis for purchasing a new tank. The condensate production from these wells is expected to be very small, approximately 0.1 BCPD per PC well. Currently, this nominal amount of condensate is not being collected and is carried over in the water and/or gas stream. Surface commingling into an existing tank will provide an economic means of collecting this condensate for the benefit of all owners.

F. Attached is NMOCD Hearing Case 10418 Exhibit No. 4 showing a schematic diagram for a typical commingling system for a dual Mesaverde/Pictured Cliffs well.

G. Not applicable.

H. The condensate commingling operation will require installing a separator on the PC well production stream (if not already in place). Condensate and water production from the separator will be separately piped to existing Mesaverde tanks for collection and sales. Production into the tank will be measured each month and allocated back to the individual well using an annual GOR test. An example of this allocation method is attached as NMOCD Hearing Case 10418 Exhibit No. 5.

I. The San Juan 28-7 Unit is federally supervised and, therefore, requires BLM approval as well as State approval. The BLM has reviewed this plan and is in general agreement with it. They have requested Amoco file for approval on an individual well basis so they have opportunity to observe and approve the annual GOR tests used in this allocation procedure. This level of supervision will ensure the operation is carried out prudently and accurately for the benefit of all owners in the unit.

Sincerely,

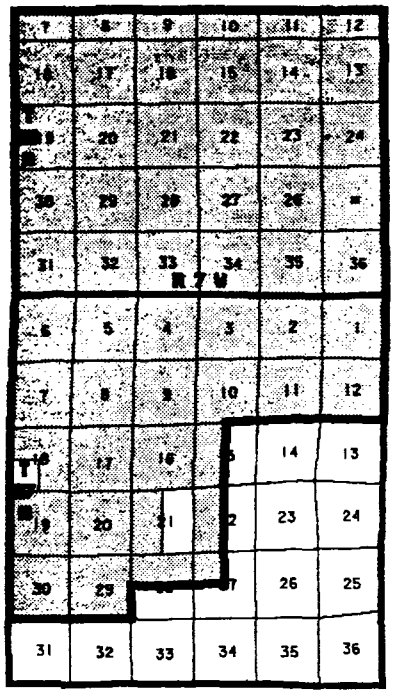
J. W. Hawkins

JWH/jmc

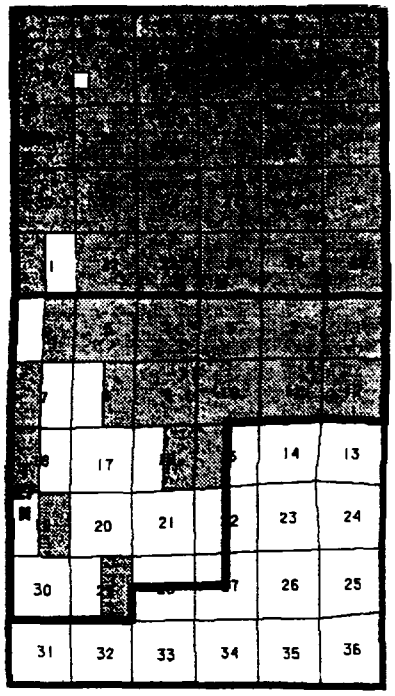
Attachments

cc: Tom Lapinski
Eric Root
Barbara Sturgeon
Eric Nitcher
John Montero

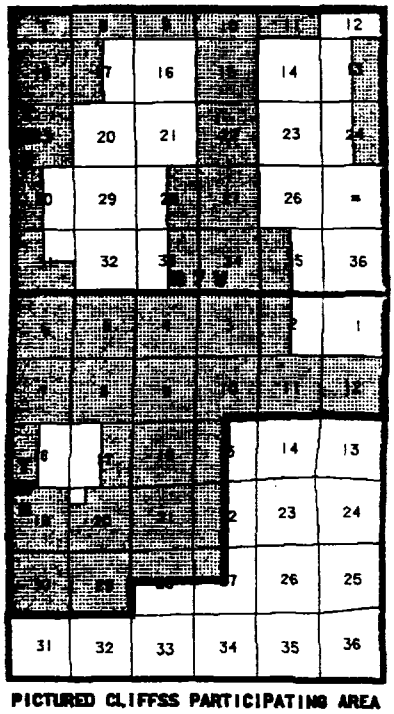
12/18/91
Jim Bow



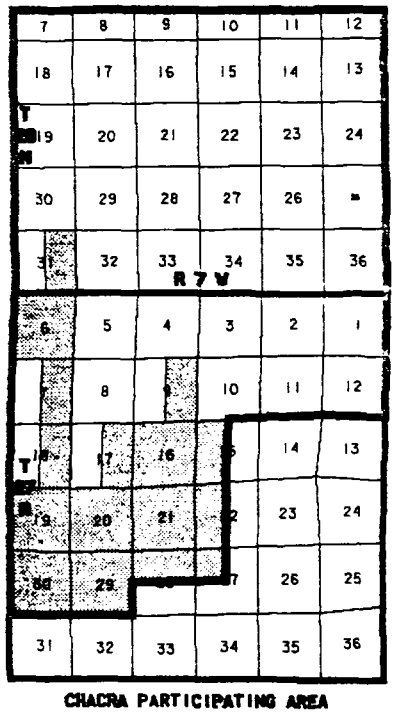
DAKOTA PARTICIPATING AREA



MESAVERDE PARTICIPATING AREA



PICTURED CLIFFSS PARTICIPATING AREA



CHACRA PARTICIPATING AREA

INTERGRAPH

Amoco Production Company

28-7 UNIT
PARTICIPATING AREAS
RIO ARRIBA CO., NEW MEXICO
NMOCD HEARING, CASE #10418

NMOCD Hearing, Case #10418
December 5, 1991

Exhibit No. 1

San Juan 28-7 Unit
Surface Commingling Cost Comparison

Cost of New Tank	$ 7500
Forecasted Condensate Revenues	
0.1 BCPD per PC Well $20 per BC 23.4% Royalties	$ 560 per year BT
Simple BT Payout	13 years

NMOCD Hearing, Case #10418
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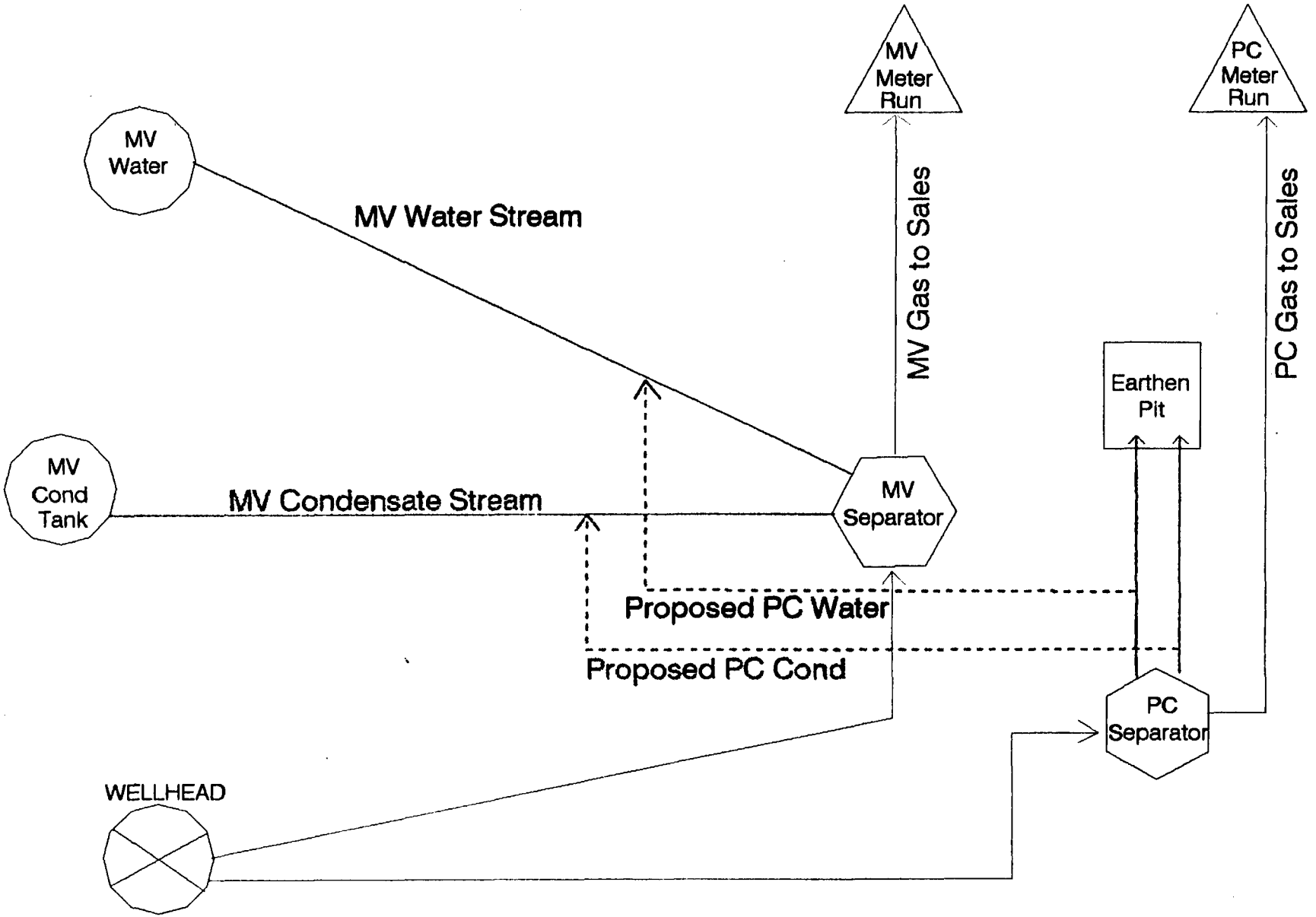
Exhibit No. 3

SURFACE COMMINGLED LIQUIDS SYSTEM



NMOCD Hearing, Case #10418
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Exhibit No. 4

SAN JUAN 28-7 UNIT
COMMINGLE ALLOCATION EXAMPLE

	Annual GOR Test (MCF/BBL)	Monthly Gas Prod. MCF
Well 1 (MV)	270	9720
Well 2 (PC)	1850	5880

Commingled condensate - 37 BBL

1. Calculate theoretical condensate production:

Well 1 (MV)	9720 MCF/270 MCF/BBL =	36.00 BBL
Well 2 (PC)	5880 MCF/1850 MCF/BBL =	3.2 BBL
Total		39.2 BBL

2. Determine allocation factor for each well:

Well 1 (MV)	36.0 BBL/39.2 BBL =	0.918
Well 2 (PC)	3.2 BBL/39.2 BBL =	0.082

3. Calculate allocated condensate production:

Well 1 (MV)	37 BBL x 0.918 =	34 BBL
Well 2 (PC)	37 BBL x 0.082 =	3 BBL

NMOCD Hearing, Case #10418
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Exhibit No. 5

Surface Commingling Candidates
San Juan 28-7 Unit

Well	Formation	Location
SJ 28-7 1	MV	A332807-001
SJ 28-7 1	PC	A332807-001
SJ 28-7 8A	MV	I182807-008A
SJ 28-7 8A	PC	I182807-008A
SJ 28-7 12A	MV	C172807-012A
SJ 28-7 12A	PC	C172807-012A
SJ 28-7 20A	MV	J082807-020A
SJ 28-7 20A	PC	J082807-020A
SJ 28-7 30A	MV	E182807-030A
SJ 28-7 30A	PC	E182807-030A
SJ 28-7 32A	MV	C192807-032A
SJ 28-7 32A	PC	C192807-032A
SJ 28-7 33A	MV	J132807-033A
SJ 28-7 33A	PC	J132807-033A
SJ 28-7 51A	MV	O242807-051A
SJ 28-7 51A	PC	O242807-051A
SJ 28-7 52	MV	H272807-052
SJ 28-7 52	PC	H272807-052
SJ 28-7 61A	MV	P102807-061A
SJ 28-7 61A	PC	P102807-061A
SJ 28-7 71	MV	L342807-071
SJ 28-7 71	PC	L342807-071
SJ 28-7 72	MV	L352807-072
SJ 28-7 72	PC	L352807-072
SJ 28-7 73	MV	A282807-073
SJ 28-7 73	PC	A282807-073
SJ 28-7 74A	MV	I112807-074A
SJ 28-7 74A	PC	I112807-074A
SJ 28-7 79	MV	H112707-079
SJ 28-7 79	PC	H112707-079
SJ 28-7 81	MV	G092707-081
SJ 28-7 81	PC	G092707-081
SJ 28-7 86	MV	K072707-086
SJ 28-7 86	PC	K072707-086
SJ 28-7 88	MV	A102707-088
SJ 28-7 88	PC	A102707-088
SJ 28-7 91	MV	B342807-091
SJ 28-7 91	PC	B342807-091
SJ 28-7 94A	MV	E302807-094A
SJ 28-7 94A	PC	E302807-094A
SJ 28-7 95	MV	M042707-095
SJ 28-7 95	PC	M042707-095
SJ 28-7 102	MV	N022707-102
SJ 28-7 102	PC	N022707-102
SJ 28-7 103	MV	A032707-103
SJ 28-7 103	PC	A032707-103
SJ 28-7 104	MV	M032707-104
SJ 28-7 104	PC	M032707-104
SJ 28-7 106X	MV	M102707-106X
SJ 28-7 106X	PC	M102707-106X
SJ 28-7 107	MV	K112707-107
SJ 28-7 107	PC	K112707-107
SJ 28-7 109	DK	N182707-109
SJ 28-7 109	MV	N182707-109
SJ 28-7 169	CK	D092707-169
SJ 28-7 169	PC	D092707-169

Well	Formation	Location
SJ 28-7 60	MV	B192807-060
SJ 28-7 146	PC	B192807-146
SJ 28-7 62	MV	G122707-062
SJ 28-7 118	PC	K122707-118
SJ 28-7 116	PC	G172707-116
SJ 28-7 154	DK	G172707-154
SJ 28-7 187	DK	A242807-187
SJ 28-7 264	PC	A242807-264