

3-30-05 4/19/05 Jones 3-30-05 DHC 15010508957994
 DATE IN SUSPENSE ENGINEER LOGGED IN TYPE APP NO.
 4/26/05 3/26/05 ABOVE THIS LINE FOR DIVISION USE ONLY 3468 BUNT 0515760571
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.

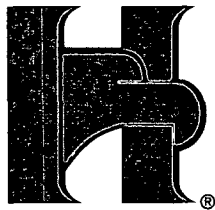
Print or Type Name

Signature

Title

Date

e-mail Address



HALLADOR PETROLEUM, LLP

HALLADOR PETROLEUM COMPANY

HALLADOR PRODUCTION COMPANY

March 28, 2005

RECEIVED

MAR 30 2005

OIL CONSERVATION
DIVISION

Mr. Mark E. Fesmire, P.E.
State of New Mexico Oil Conservation Division
1220 South St. Francis Drive
Santa Fe, New Mexico 87505

Re: Application for Administrative Approval for Downhole Commingling
Basin Dakota and Blanco Mesaverde Pools
Horton #1C
Unit A Section 7 T31N R11W
San Juan County, New Mexico

Dear Mr. Fesmire:

Hallador Petroleum, LLP requests administrative approval for downhole commingling of the Basin Dakota and the Blanco Mesaverde Pools in the subject well bore. The following information is provided in support of this application.

The Horton #1C is scheduled to be drilled to a total depth of 7815' in the summer of 2005.

The attached C-102 plat shows the east half of section 7, T31N R11W as the 320 acre spacing unit for the Dakota and the Mesaverde.

The attached application form (C-107A) shows the proposed allocation percentages for each pool. The proposed allocation for gas production is based on the average Estimated Ultimate Recovery (EUR) for Mesaverde wells and Dakota wells in a nine section area surrounding section 7 T31N R11W. Oil production is expected to be minor. The proposed allocation for oil is based on the average cumulative (CUM) production for Mesaverde wells and Dakota wells in the same nine section area.

Dakota and Mesaverde fluids have been generally determined to be compatible across the basin based on previously approved applications. In the event commingle causing some minor reactions, chemical treatments have proved to be successful in mitigating scaling/precipitate problems.

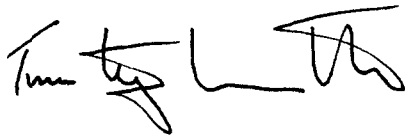
The current casing pressure in the nearby Horton #1A is 285 psi which is a measurement of the long term shut-in reservoir pressure of the Mesaverde. The estimated current reservoir pressure of the Dakota in the Horton #1A is about 290 psi based on a recent shut-in test. Because the Dakota and Mesaverde formation pressures are about equal, we do not expect cross-flow to be a problem.

All working, royalty and overriding royalty interest owners have been notified by certified mail.

Commingling of the Basin Dakota and the Blanco Mesaverde pools will minimize operation costs and add reserves by extending the life of the well. In addition, correlative rights will be protected. We therefore respectfully request your approval of this application.

If you have any questions or need additional information, please call me at (303) 839-5504 ext. 317.

Sincerely,

A handwritten signature in black ink, appearing to read 'Timothy Lovseth', with a stylized flourish at the end.

Timothy Lovseth
Exploration Manager

Attachments:

- Form C-107A
- Form C-102
- EUR Tables
- Notification list of interest owners

State of New Mexico
Energy, Minerals & Mining Resources Department
OIL CONSERVATION DIVISION
2040 South Pacheco
Santa Fe, NM 87505

Form C - 102

☐ AMENDED REPORT

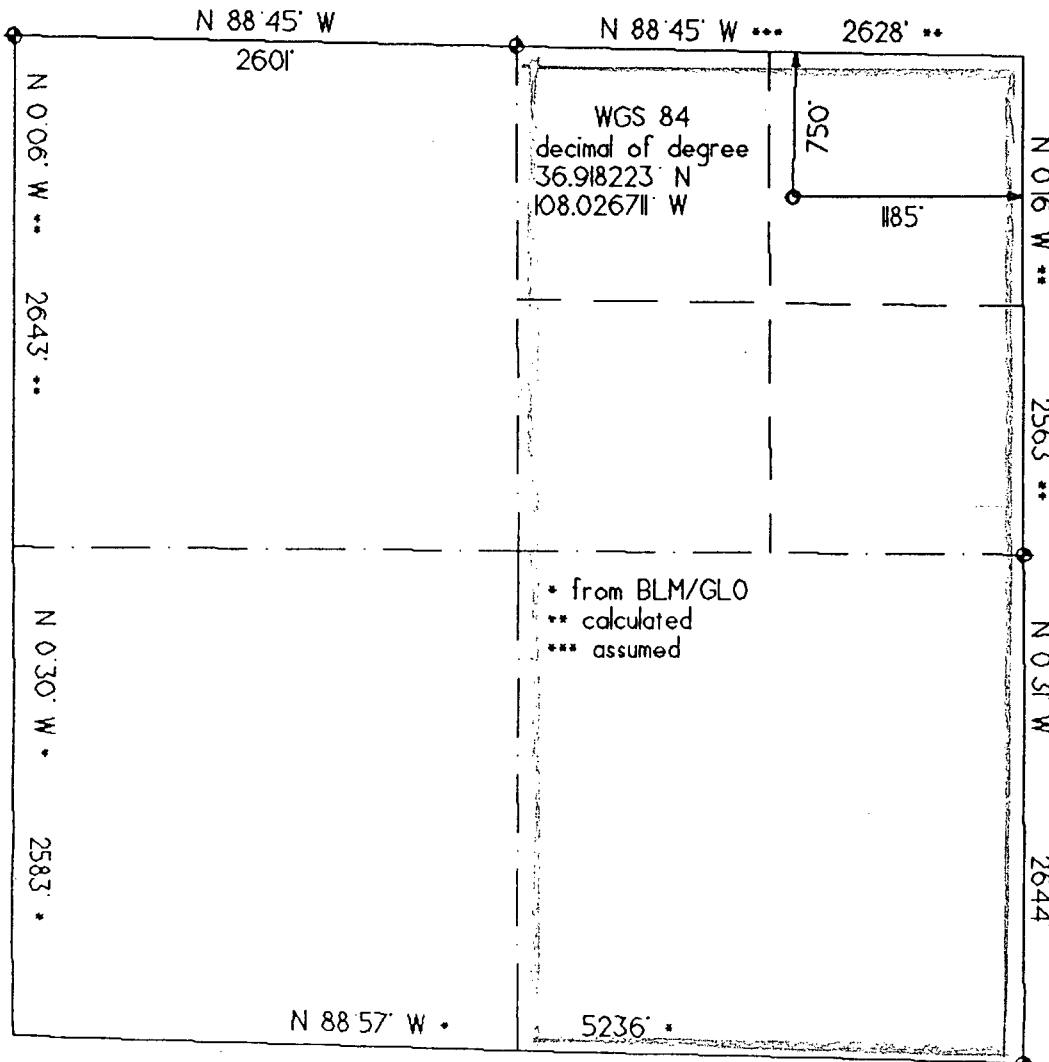
WELL LOCATION AND ACREAGE DEDICATION PLAT

APA Number	Pool Code	Pool Name
Property Code	Property Name HORTON	
OGRD No.	Operator Name QUESTAR EXPLORATION & PRODUCTION	
		Well Number I C
		Elevation 6477'

Surface Location									
UL or Lot	Sec.	Twp.	Rge.	Lot Lch.	Feet from >	North/South	Feet from >	East/West	County
A	7	31 N	11 W		750'	NORTH	1185'	EAST	

Bottom Hole Location If Different From Surface									
UL or Lot	Sec.	Twp.	Rge.	Lot Lch.	Feet from >	North/South	Feet from >	East/West	County
									SAN JUAN
Dedication		Joint ?		Consolidation		Order No.			

NO ALLOWABLE WILL ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED
OR A NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION



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	
Title	
Date	
SURVEYOR CERTIFICATION	
I hereby certify that the well location 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 belief.	
Date of Survey 01/21/05	
<i>Gerald G. Huddleston</i> <i>James A. Huddleston</i>	

NOTIFICATION LIST
Interest Owners

Mr. Dennis Beccue
Questar Exploration & Production Company
1050 Seventeenth Street, Suite 500
Denver, CO 80265

The Salvation Army
c/o Mr. Gary Jerman
Suite 326, 1645 Court Place
Denver, CO 80202

Ms. Patricia Laudermilk
404 East Monroe
Sterling, KS 67579

Ms. Jaxcene L. Heinze
Suite 1180, 410 Seventeenth Street
Denver, CO 80202

Dr. Cynthia Calvin
747 Newport Street
Denver, CO 80220

Mr. Edward M. Calvin
2380 Forest Street
Denver, CO 80207-3261

Mr. Thomas J. Scarbrough
Conoco Phillips, Inc.
P. O. Box 2197
Houston, TX 77252-2197

Mr. Holmes P. McLish
McLish Resources, L.P., L.L.P.
Suite 1650, 633 Seventeenth Street
Denver, CO 80202

Mr. W. Clifton Arbuckle
Lamotte Oil Company
Suite 1180, 410 Seventeenth Street
Denver, CO 80202

Mr. Elliott Riggs
Mesa Verde Gas and Oil Company
P. O. Box 711
Farmington, NM 87499-0711

Mr. C. Crady Davis
Crady Davis Corporation
1900 East Girard Place
Apartment 907
Englewood, CO 80110

Ms. Katharine Boyd Dernocoeur
Mr. Thomas K. Boyd
Laurel Hill Trust
1200 Fero Road
Lowell, MI 49331

Mr. William R. Thurston, Tr.
P. O. Box 2080
Durango, CO 81302

Mr. Raymond G. Stone
67 West Bonanza Place
Parachute, CO 81635

Ms. Anna M. Venen
4751 East Costilla Avenue, Apt. 118
Centennial, CO 80122

Mr. Walter K. Arbuckle, Trustee
Suite 1180, 410 Seventeenth Street
Denver, CO 80202

Mr. and Mrs. Wm. Allbright
WBA Colorado Company
DMA Company
9 Ambleside Drive
Belleair, FL 34616

Mr. John Calvin
733 Chaves Road NW
Albuquerque, NM 87107

Ms. Susan D. Horton
5039 Seneca Drive
Dallas, TX 75209

Ms. Sarah S. Mims Revocable Trust
P.O. Box 111846
Carrollton, TX 75011-1846

Ms. Harriet M. Buchenau
Living Trust
P.O. Box 867585
Plano, TX 75086-7585

Mr. Paul B. Horton
5039 Seneca Drive
Dallas, TX 75209

Ms. Betsy Bryant
2201 Brookhollow
Abilene, TX 79605

Ms. Susan H. Ritter
4700 Via Media
Austin, TX 78746

Mr. Robert Beamon
Suite 1050
2603 Augusta
Houston, TX 77057

Ms. Anne V. Pogson, Trustee
Gladys Watford Trust
12112 Talmay Drive
Dallas, TX 75230

Ms. Henrietta Schultz Individually and
Exec. U/W/O Frank Schultz & Trustee
Of Schultz Revocable Trust
500 N Akard, Suite 2940
Dallas, TX 75201-3360

Griffith & Stone Royalty
114 Pamellia Drive
Bellaire, TX 77401

Ms. Claudia Lundell Gilmer
101 Oak Meadow Drive
Georgetown, TX 78628

Mr. Robert Walter Lundell
Suite 304
2450 Fondren
Houston, TX 77063

Ms. Linda Lundell Lindsey
P.O. Box 631565
Nacogdoches, TX 75963

Pure Resources LP.
P.O. Box 910552
Dallas, TX 75391-0552

Ms. Mitzi Easley
1203 Arronimink Circle
Austin, TX 78746

XTO Energy Inc.
Dept. 4849
135 S. LaSalle Street
Chicago, IL 60674-4849

Warren American Oil Company
P.O. Box 470372
Tulsa, OK 74147-0372

Bureau of Land Management
1235 La Plata Hwy, Suite A
Farmington, NM 87401-1808

Section 7-31N-11W
SF-078095A
Horton #1C

Owners			Dakota Working Interest	Dakota Net Revenue Interest	Mesaverde Working Interest	Mesaverde Net Revenue Interest
1139	Walter K. Arbuckle, Tr.	WI	0.08623757	0.07287070	0.09889400	0.08361488
1128	W. Clifton Arbuckle	WI	0.00153272	0.00129510	0.00000000	0.00000000
1097	Cynthia Calvin	WI	0.01089976	0.00921030	0.01250000	0.01056875
1098	Edward M. Calvin	WI	0.01089976	0.00921030	0.01250000	0.01056875
1096	John R. Calvin	WI	0.01089976	0.00921030	0.01250000	0.01056875
1099	Crady Davis Corporation	WI	0.08623757	0.07287070	0.09889400	0.08361488
1126	DMA Company	WI	0.05696385	0.04813450	0.06532400	0.05523144
1131	Jaxcene L. Heinze	WI	0.01533076	0.01295450	0.00000000	0.00000000
100	Hallador Petroleum, LLP	WI	0.05189654	0.04385260	0.05951300	0.05031824
1095	Patricia Lauder milk	WI	0.00259930	0.00219640	0.00305800	0.00258554
1127	Katharine Boyd Dernocoeur, Tr.	WI	0.16153060	0.13649340	0.19003600	0.16067544
1089	McLish Resources, L.P., L.L.P.	WI	0.03270076	0.02763220	0.03750000	0.03170625
4128	Phillips Petroleum Company	WI	0.15000000	0.12675000	0.00000000	0.00000000
1107	Questar E & P Company	WI	0.21250000	0.17956250	0.25000000	0.18625000
1091	Elliott A. Riggs	WI	0.01033021	0.00872900	0.00305800	0.00258554
1100	Salvation Army, The	WI	0.00000000	0.00000000	0.04218800	0.03566996
1088	Raymond G. Stone, Tr.	WI	0.00266664	0.00225330	0.00305800	0.00258554
1138	William R. Thurston, Tr.	WI	0.08623757	0.07287070	0.09889400	0.08361488
1090	Anna M. Venen	WI	0.00266664	0.00225330	0.00305800	0.00258554
1125	WBA Colorado Company	WI	0.00786998	0.00665020	0.00902500	0.00763064
1141	Susan D. Horton	OR	0.00000000	0.00125000	0.00000000	0.00115625
1142	Sarah S. Mims Revocable Trust	OR	0.00000000	0.00062501	0.00000000	0.00057813
1146	Harriet M .Buchenau	OR	0.00000000	0.00062499	0.00000000	0.00057812
1147	Paul B. Horton	OR	0.00000000	0.00125000	0.00000000	0.00115625
1159	Betsy Bryant	OR	0.00000000	0.00041667	0.00000000	0.00038541
1160	Susan H. Ritter	OR	0.00000000	0.00041667	0.00000000	0.00038541
1161	Mitzi Easley	OR	0.00000000	0.00041666	0.00000000	0.00038541
1145	Robert Beamon	OR	0.00000000	0.00062500	0.00000000	0.00062500
1155	Gladys Watford Trust	OR	0.00000000	0.00062500	0.00000000	0.00062500
1157	Griffith & Stone Royalty	OR	0.00000000	0.00062500	0.00000000	0.00062500
3480	Robert Walter Lundell	OR	0.00000000	0.00020833	0.00000000	0.00020833
3481	Claudia Lundell Gilmer	OR	0.00000000	0.00020833	0.00000000	0.00020834
3482	Linda Lundell Lindsey	OR	0.00000000	0.00020834	0.00000000	0.00020833
3580	Pure Resources LP	OR	0.00000000	0.02250000	0.00000000	0.02250000
1143	Henrietta Schultz Indiv. & Exec.	OR	0.00000000	0.00000000	0.00000000	0.00416675
1154	Cross Timbers Oil Company	OR	0.00000000	0.00000000	0.00000000	0.01875000
3210	Warren American Oil Company	OR	0.00000000	0.00000000	0.00000000	0.00208325
1163	DOI/MMS	RI	0.00000000	0.12500000	0.00000000	0.12500000
			1.00000000	1.00000000	1.00000000	1.00000000

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

State of New Mexico
Energy, Minerals and Natural Resources Department

Form C-107A
Revised June 10, 2003

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

APPLICATION TYPE
x Single Well
Establish Pre-Approved Pools
EXISTING WELLBORE
Yes x No

APPLICATION FOR DOWNHOLE COMMINGLING

Hallador Petroleum, LLP 1660 Lincoln Street, Suite 2700, Denver CO 80264

Operator Address
Horton IC Unit A 7 T31N R11W San Juan

Lease Well No. Unit Letter-Section-Township-Range County
30-045-

OGRID No. Property Code API No. 33061 Lease Type: x Federal State Fee

DATA ELEMENT	UPPER ZONE	INTERMEDIATE ZONE	LOWER ZONE
Pool Name	Blanco-Mesaverde ✓		Basin-Dakota ✓
Pool Code	72319 ✓		71599 ✓
Top and Bottom of Pay Section (Perforated or Open-Hole Interval)			
Method of Production (Flowing or Artificial Lift)	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)	Not Required		Not Required
Oil Gravity or Gas BTU (Degree API or Gas BTU)	1.242 BTU as found in Horton #1A		1.152 BTU as found in Horton #1A
Producing, Shut-In or New Zone	New Zone		New Zone
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: see EUR/CUM tables Rates:	Date: Rates:	Date: see EUR/CUM tables Rates:
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 39.3 % 53.5 %	Oil Gas % %	Oil Gas 60.7 % 46.5 %

ADDITIONAL DATA

Are all working, royalty and overriding royalty interests identical in all commingled zones? Yes No x
If not, have all working, royalty and overriding royalty interest owners been notified by certified mail? Yes x 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 x No

NMOCD Reference Case No. applicable to this well:

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 Exploration Manager DATE 3/15/05

TYPE OR PRINT NAME TELEPHONE NO. (303) 839-5504 ext 317

E-MAIL ADDRESS timlovseth@qwest.net

Jones, William V

From: Jones, William V
Sent: Wednesday, April 20, 2005 3:45 PM
To: 'timlovseth@qwest.net'
Cc: Villanueva, Mary Ellen; Hayden, Steven
Subject: Hallador Petroleum LLP's DHC request for the Horton #1C A/7/31N/11W San Juan County

Hello Tim:

I received your request for a permit to Downhole Commingle this well and everything looks OK.

All of our data is keyed on the API number and processing permits without it is done only rarely.

Please let me know by email or letter the API number for the well, and I will release the permit.

I will hold the permit as inactive until I receive the API.

Regards,

William V. Jones

Engineering Bureau

Oil Conservation Division

Santa Fe

4/20/2005

API	WELLNAME	WELLNO	SEC	T	R		EUR KMV	CUM KMV
							MCF	BBLs
3004511032	DUSENBERRY	002	1	31N	12W		4619553	16964
3004511068	DAVIS	003	1	31N	12W		3697997	10793
3004511085	DAVIS	013	1	31N	12W		414208	93
3004521813	DUSENBERRY	002A	1	31N	12W		1712975	5945
3004522264	DAVIS	003A	1	31N	12W		3449035	13002
3004523644	DUSENBERRY	003E	1	31N	12W		204444	352
3004511006	CASE B	001	5	31N	11W		2114874	1246
3004511074	CASE B	006	5	31N	11W		2043008	4005
3004511078	MUDGE LS	023	5	31N	11W		8044	0
3004522836	CASE B	001A	5	31N	11W		4102275	14023
3004522837	CASE B	006A	5	31N	11W		1380271	2937
3004530632	MUDGE LS	023M	5	31N	11W		428738	372
3004511005	GRENIER	001	6	31N	11W		4067420	9749
3004511064	DUSENBERRY	001	6	31N	11W		2092800	7489
3004511698	GRENIER	017	6	31N	11W		652930	2595
3004521794	GRENIER	001A	6	31N	11W		640244	947
3004522111	DUSENBERRY	001A	6	31N	11W		2757223	12213
3004530005	DUSENBERRY	001B	6	31N	11W		725107	1713
3004530240	GRENIER	001B	6	31N	11W		294256	607
3004510841	HORTON	001	7	31N	11W		2555520	0
3004510949	GRENIER	004	7	31N	11W		5927194	16411
3004510952	GRENIER	014	7	31N	11W		354343	554
3004521955	HORTON	001A	7	31N	11W		1187151	2020
3004521795	GRENIER	004A	7	31N	11W		1967087	4920
3004530165	HORTON	1B	7	31N	11W		812459	553
3004510864	CASE B	002	8	31N	11W		3423464	5029
3004510879	CASE LS	009	8	31N	11W		160735	496
3004510924	MUDGE B	015	8	31N	11W		2375899	4989
3004523174	CASE B	002A	8	31N	11W		1623971	7357
3004523160	MUDGE B	015A	8	31N	11W		1487190	5342
3004510947	DAVIS	004	12	31N	12W		4449001	16514
3004510855	DAVIS	006	12	31N	12W		2124823	4873
3004510878	DAVIS	009	12	31N	12W		428029	35
3004510946	DAVIS	010	12	31N	12W		1400864	2089
3004522267	DAVIS	004A	12	31N	12W		1603946	4472
3004522314	DAVIS	006A	12	31N	12W		2620568	13625
3004523982	DAVIS	009E	12	31N	12W		897791	0
3004560038	GRENIER	003	13	31N	12W		2494485	6256
3004510787	GRENIER	005	13	31N	12W		4230277	13906
3004510763	GRENIER	011	13	31N	12W		122906	10
3004510673	GRENIER	012	13	31N	12W		239144	431
3004522268	GRENIER	003A	13	31N	12W		1530666	5266
3004521878	GRENIER	005A	13	31N	12W		645021	720
3004530000	GRENIER	005B	13	31N	12W		568474	1449
3004523646	GRENIER	011E	13	31N	12W		330016	0
3004530117	GRENIER	012M	13	31N	12W		429794	1198
3004510694	CASE B	003	17	31N	11W		1677945	3793
3004510764	MUDGE B	012	17	31N	11W		1772240	3047
3004523175	CASE B	003A	17	31N	11W		4377421	13227
3004523176	MUDGE B	012A	17	31N	11W		2222692	7059
3004510792	MUDGE B	012R	17	31N	11W		765275	0
3004530758	MUDGE B	019M	17	31N	11W		46646	38
3004510788	GRENIER	002	18	31N	11W		2280245	6121
3004510685	CASE B	004	18	31N	11W		1291949	350
3004510784	CASE	8	18	31N	11W		43716	0
3004511668	GRENIER	015	18	31N	11W		294548	471
3004522262	GRENIER	002A	18	31N	11W		178736	4183
3004530007	GRENIER	002B	18	31N	11W		478780	1235
3004523191	CASE B	004A	18	31N	11W		1879354	5359
AVE EUR (MCF)/CUM (BBLs) FOR MESAVERDE PRODUCER							1672979	4550

API	WELLNAME	WELLNO	SEC	T	R		EUR KD	CUM KD
							MCF	BBLs
3004511085	DAVIS	013	1	31N	12W		952317	3596
3004524018	DAVIS	013E	1	31N	12W		1668750	6275
3004511042	DUSENBERRY	003	1	31N	12W		2338951	7615
3004523644	DUSENBERRY	003E	1	31N	12W		995459	548
3004523433	CASE A	003	5	31N	11W		493919	2133
3004524738	CASE A	003E	5	31N	11W		711164	2059
3004511078	MUDGE LS	023	5	31N	11W		449163	769
3004530632	MUDGE LS	023M	5	31N	11W		251934	323
3004511698	GRENIER	017	6	31N	11W		3887525	15408
3004511699	GRENIER	016	6	31N	11W		2786708	7530
3004523643	GRENIER	017E	6	31N	11W		880161	2604
3004530240	GRENIER	001B	6	31N	11W		316935	612
3004510952	GRENIER	014	7	31N	11W		3238705	13807
3004521955	HORTON	001A	7	31N	11W		634003	834
3004510879	CASE LS	009	8	31N	11W		1835184	991
3004513208	MUDGE B	020	8	31N	11W		1651243	287
3004510878	DAVIS	009	12	31N	12W		2121715	10810
3004510946	DAVIS	010	12	31N	12W		3992530	25866
3004523982	DAVIS	009E	12	31N	12W		637387	838
3004524145	DAVIS	010E	12	31N	12W		995323	3295
3004510673	GRENIER	012	13	31N	12W		2115376	22253
3004510763	GRENIER	011	13	31N	12W		2880737	28208
3004523646	GRENIER	011E	13	31N	12W		2052612	16154
3004530117	GRENIER	012M	13	31N	12W		630202	1195
3004530466	GRENIER	011F	13	31N	12W		536116	453
3004523434	CASE A	002	17	31N	11W		472384	2454
3004524603	CASE A	002E	17	31N	11W		970930	4325
3004510792	MUDGE B	012R	17	31N	11W		257786	249
3004510784	CASE	8	18	31N	11W		162202	648
3004524041	CASE A	004	18	31N	11W		2521382	13249
3004524618	CASE A	004E	18	31N	11W		692648	2918
3004511668	GRENIER	015	18	31N	11W		848267	11548
3004525331	GRENIER	015E	18	31N	11W		3087443	21738
AVE EUR (MCF)/CUM (BBLs) FOR DAKOTA PRODUCER							1456581	7018

Allocation Determination			
		MCF GAS % of Total	
Kmv EUR	1672979	53.5%	
Kd EUR	1456581	46.5%	
		100.0%	
		BBLs OIL % of Total	
Kmv CUM	4550	39.3%	
Kd CUM	7018	60.7%	
		100.0%	