

DATE IN <b>7/8/98</b>	SUSPENSE <b>7/28/98</b>	ENGINEER <b>DC</b>	LOGGED BY <b>MV</b>	TYPE <b>DHC</b>
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ABOVE THIS LINE FOR DIVISION USE ONLY

# NEW MEXICO OIL CONSERVATION DIVISION

- Engineering Bureau -

2040 South Pacheco, Santa Fe, NM 87505



2057

## ADMINISTRATIVE APPLICATION COVERSHEET

THIS COVERSHEET IS MANDATORY FOR ALL ADMINISTRATIVE APPLICATION FOR EXCEPTIONS TO DIVISION RULES AND REGULATIONS WHICH REQUIRE PROCESSING AT THE DIVISION LEVEL IN SANTA FE

### Application Acronyms:

- [NSP-Non-Standard Proration Unit] [NSL-Non-Standard Location]**  
**[DD-Directional Drilling] [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 - Directional Drilling**  
☐ NSL ☐ NSP ☐ DD ☐ 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

### [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] INFORMATION / DATA SUBMITTED IS COMPLETE - Certification

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 (including API numbers, pool codes, etc.), pertinent information and any required notification is cause to have the application package returned with no action taken.

Note: Statement must be completed by an individual with managerial and/or supervisory capacity.

Print or Type Name

Signature

Title

Date

DISTRICT I  
P.O. Box 1980, Hobbs, NM 88241-1980  
DISTRICT 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 Resources Department  
OIL CONSERVATION DIVISION  
2040 S. Pacheco  
Santa Fe, New Mexico 87505-6429

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

APPROVAL PROCESS :

☒ Administrative ☐ Hearing

EXISTING WELLBORE

☐ YES ☒ NO

APPLICATION FOR DOWNHOLE COMMINGLING

Burlington Resources Oil & Gas Company

PO Box 4289, Farmington, NM 87499

Operator

Address

San Juan 27-4 Unit

102M

D 33-27N-04W

Rio Arriba

Lease

Well No.

Unit Ltr. - Sec - Twp - Rge

County

Spacing Unit Lease Types: (check 1 or more)

OGRID NO. 14538 Property Code 7452 API NO. 30-039-not assigned Federal ☒ State (and/or) Fee

The following facts are submitted in support of downhole commingling:	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)	will be supplied upon completion		will be supplied upon completion
3. Type of production (Oil or Gas)	gas		gas
4. Method of Production (Flowing or Artificial Lift)	flowing		flowing
5. Bottomhole Pressure Oil Zones - Artificial Lift: Estimated Current Gas & Oil - Flowing: Measured Current All Gas Zones: Estimated or Measured Original	(Current) a. 678 psi (see attachment)  (Original) b. 1409 psi (see attachment)	a.  b.	a. 1107 psi (see attachment)  b. 3004 psi (see attachment)
6. Oil Gravity (API) or Gas BTU Content	BTU 1195		BTU 1215
7. Producing or Shut-In?	shut in		shut in
Production Marginal? (yes or no)	no		yes
* If Shut-In and oil/gas/water rates of last production  <small>Note: For new zones with no production history, applicant shall be required to attach production estimates and supporting data.</small>	Date: n/a Rates:	Date: Rates:	Date: n/a Rates:
* If Producing, give data and oil/gas/water water of recent test (within 60 days)	Date: n/a Rates:	Date: Rates:	Date: n/a Rates:
8. Fixed Percentage Allocation Formula -% for each zone (total of %'s to equal 100%)	Oil: % Gas: % will be supplied upon completion	Oil: % Gas: %	Oil: % Gas: % will be supplied upon completion

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.
10. Are all working, overriding, and royalty interests identical in all commingled zones? ☐ Yes ☒ No  
If not, have all working, overriding, and royalty interests been notified by certified mail? ☒ Yes ☐ No  
Have all offset operators been given written notice of the proposed downhole commingling? ☒ Yes ☐ No
11. Will cross-flow occur? ☒ Yes ☐ No If yes, are fluids compatible, will the formations not be damaged, will any cross-flowed production be recovered, and will the allocation formula be reliable. ☒ Yes ☐ No (If No, attach explanation)
12. Are all produced fluids from all commingled zones compatible with each other? ☒ Yes ☐ No
13. Will the value of production be decreased by commingling? ☐ Yes ☒ 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. ☒ Yes ☐ No
15. NMOCD Reference Cases for Rule 303(D) Exceptions: ORDER NO(S). \_\_\_\_\_
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 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 Sean Woolverton TITLE: Reservoir Engineer DATE: 06-29-98

TYPE OR PRINT NAME Sean Woolverton TELEPHONE NO. ( 505 ) 326-9700

**OIL CONSERVATION DIVISION**  
**PO Box 2088**  
**Santa Fe, NM 87504-2088**

AMENDED REPORT

# WELL LOCATION AND ACREAGE DEDICATION PLAT

1 API Number		2 Pool Code		3 Pool Name	
30-039-		72319/71599		Blanco Mesaverde/Basin Dakota	
4 Property Code		5 Property Name			6 Well Number
7452		SAN JUAN 27-4 UNIT			# 102M
7 OGRID No.		8 Operator Name			9 Elevation
14538		BURLINGTON RESOURCES OIL & GAS COMPANY			7185

## <sup>10</sup> Surface Location

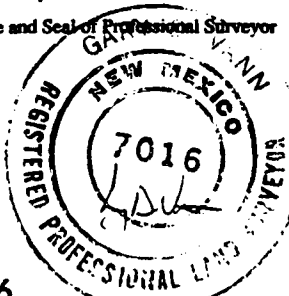
UL or Lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
D	33	27 N	4 W		840	NORTH	1110	WEST	RIO AR

## " 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
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<input type="checkbox"/> Dedicated Acres MV-W/320 DK-N/320	<input type="checkbox"/> Joint or Infill	<input type="checkbox"/> Consolidation Code	<input type="checkbox"/> Order No.
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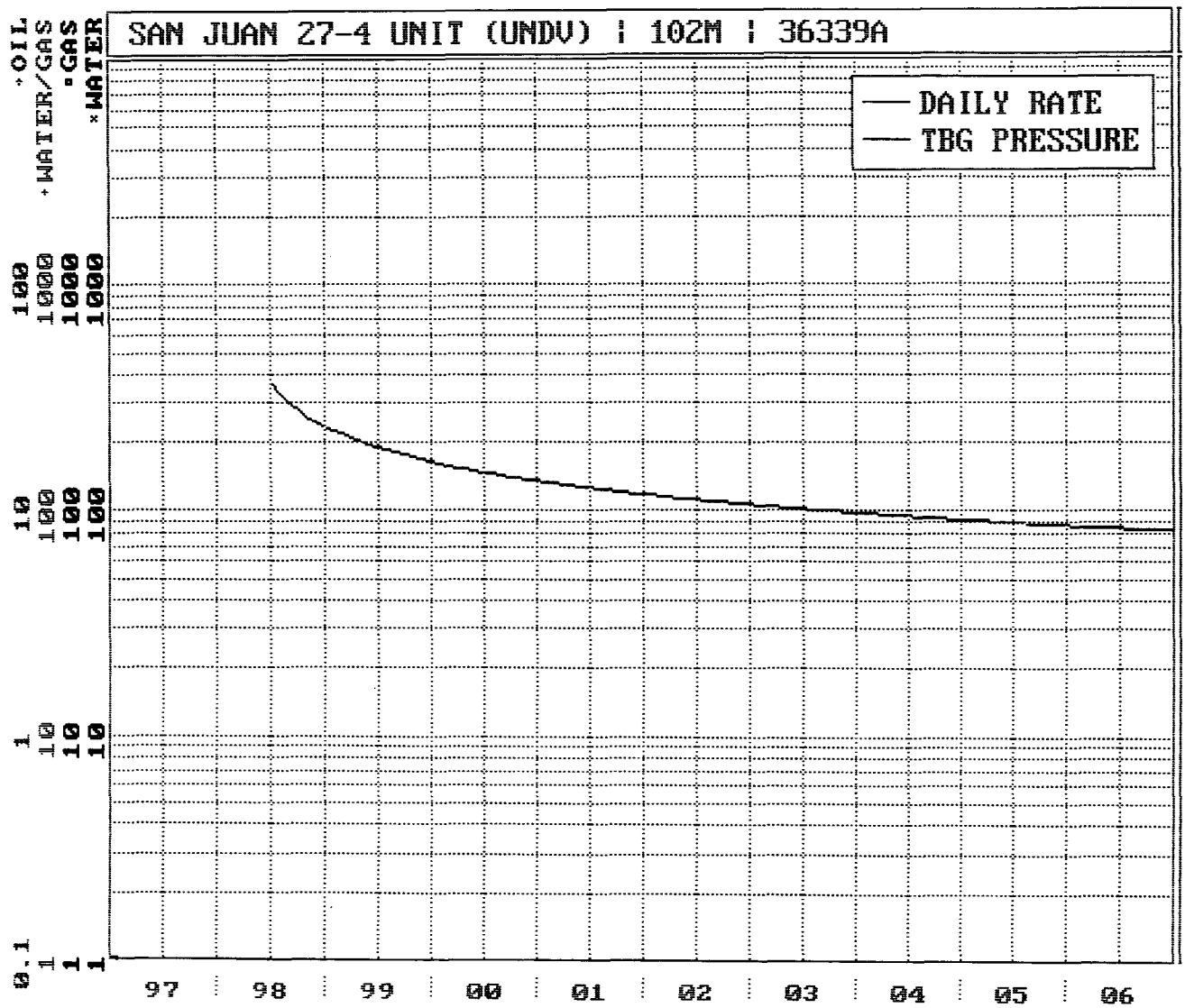
**NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTEREST HAVE BEEN CONSOLIDATED OR A NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION**

<div>16</div> <div>840'</div> <div>1110'</div> <div>NMSF - 080675</div> <div>33</div> <div>NMSF - 080675</div> <div>5260'(R)</div> <div>5280'(R)</div> <div>5280'(R)</div>		<div>17</div> <div>OPERATOR CERTIFICATION</div> <div>I hereby certify that the information contained hereon is true and complete to the best of my knowledge and belief.</div> <div>Signature</div> <div>Peggy Bradfield</div> <div>Printed Name</div> <div>Regulatory Administrator</div> <div>Title</div> <div>Date</div>
		<div>" SURVEYOR CERTIFICATION</div> <div>I hereby certify that the well location shown on this map 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.</div> <div>February 23, 1998</div> <div>Date of Survey</div> <div>Signature and Seal of Professional Surveyor</div> <div></div> <div>7016</div> <div>Certificate Number</div>

San Juan 27-4 Unit #102M

Expected Production Curve

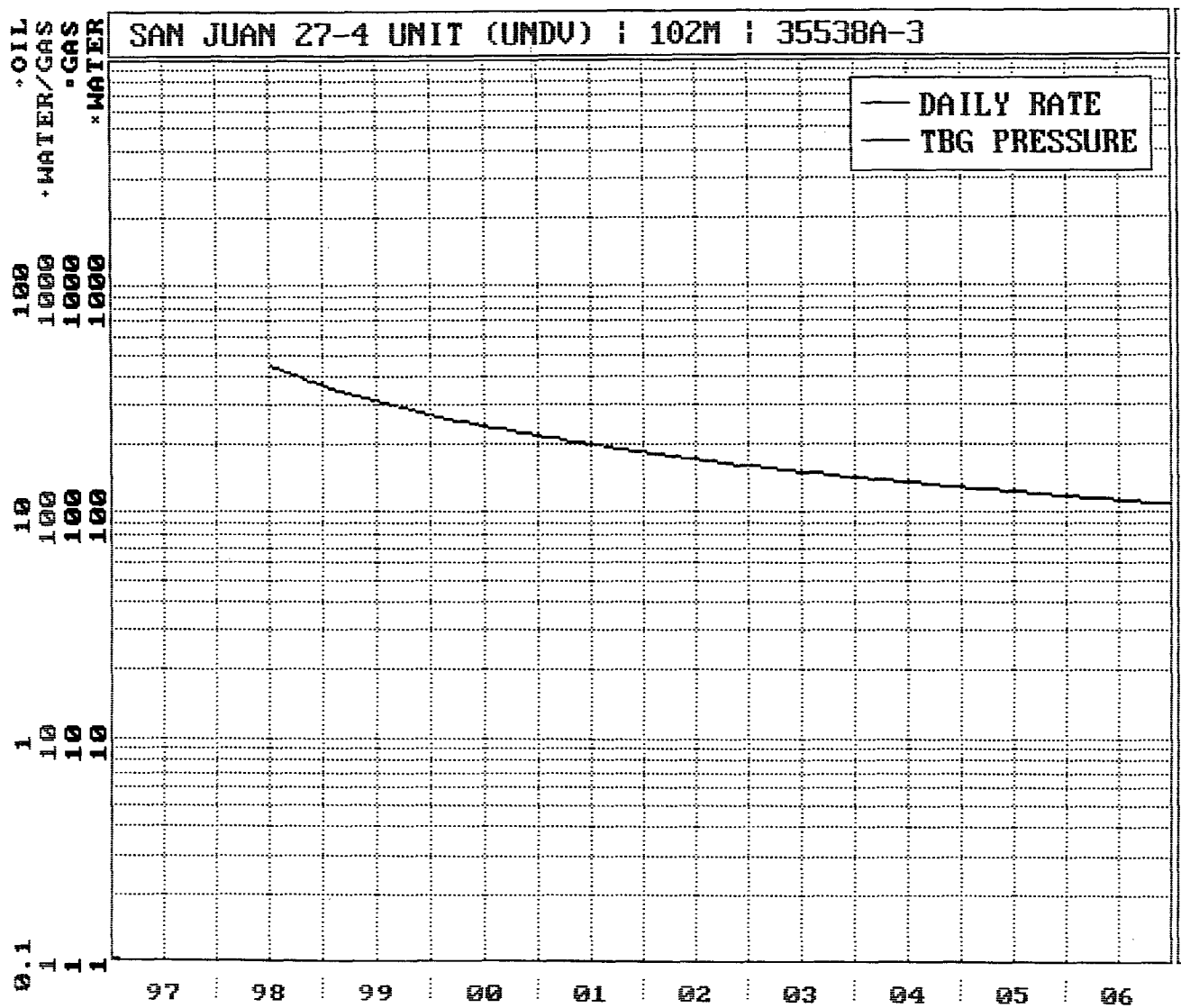
Blanco Mesaverde



San Juan 27-4 Unit #102M

Expected Production Curve

Basin Dakota



**SJ 27-4 Unit #102M**

Bottom Hole Pressures  
Flowing and Static BHP  
Cullender and Smith Method  
Version 1.0 3/13/94

<b>Mesaverde</b>		<b>Dakota</b>	
<u><b>MV-Current</b></u>		<u><b>DK-Current</b></u>	
GAS GRAVITY	0.7	GAS GRAVITY	0.714
COND. OR MISC. (C/M)	C	COND. OR MISC. (C/M)	C
%N2	0.23	%N2	0.29
%CO2	0.83	%CO2	0.91
%H2S	0	%H2S	0
DIAMETER (IN)	2.375	DIAMETER (IN)	2.375
DEPTH (FT)	6387	DEPTH (FT)	8163
SURFACE TEMPERATURE (DEG F)	60	SURFACE TEMPERATURE (DEG F)	60
BOTTOMHOLE TEMPERATURE (DEG F)	137	BOTTOMHOLE TEMPERATURE (DEG F)	198
FLOWRATE (MCFPD)	0	FLOWRATE (MCFPD)	0
SURFACE PRESSURE (PSIA)	574	SURFACE PRESSURE (PSIA)	892
BOTTOMHOLE PRESSURE (PSIA)	678.4	BOTTOMHOLE PRESSURE (PSIA)	1106.6
<u><b>MV-Original</b></u>		<u><b>DK-Original</b></u>	
GAS GRAVITY	0.7	GAS GRAVITY	0.714
COND. OR MISC. (C/M)	C	COND. OR MISC. (C/M)	C
%N2	0.23	%N2	0.29
%CO2	0.83	%CO2	0.91
%H2S	0	%H2S	0
DIAMETER (IN)	2.375	DIAMETER (IN)	2.375
DEPTH (FT)	6387	DEPTH (FT)	8163
SURFACE TEMPERATURE (DEG F)	60	SURFACE TEMPERATURE (DEG F)	60
BOTTOMHOLE TEMPERATURE (DEG F)	137	BOTTOMHOLE TEMPERATURE (DEG F)	198
FLOWRATE (MCFPD)	0	FLOWRATE (MCFPD)	0
SURFACE PRESSURE (PSIA)	1170	SURFACE PRESSURE (PSIA)	2372
BOTTOMHOLE PRESSURE (PSIA)	1409.1	BOTTOMHOLE PRESSURE (PSIA)	3004.0

Page No.: 1  
Print Time: Wed Jan 14 16:08:51 1998  
Property ID: 1646  
Property Name: SAN JUAN 27-4 UNIT | 54 | 51794A-1  
Table Name: K:\ARIES\RR98PDP\TEST.DBF

--DATE-- M SIWHP  
■■■■■■■■■■ ■■■■Psi■■■

10/16/68	2372.0	-original
06/13/69	1405.0	
06/24/70	1040.0	
05/18/71	921.0	
06/13/72	812.0	
07/06/77	822.0	
05/01/79	821.0	
06/01/81	723.0	
05/20/85	972.0	
04/22/90	983.0	
06/15/93	892.0	- current

San Juan 27-4 Unit # 102M  
Dakota Offset

Page No.: 1

Print Time: Wed Jan 14 16:08:58 1998

Property ID: 3769

Property Name: SAN JUAN 27-4 UNIT | 136 | 44664A-1

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■■■■■■■■■■ ■■■Psi■■■

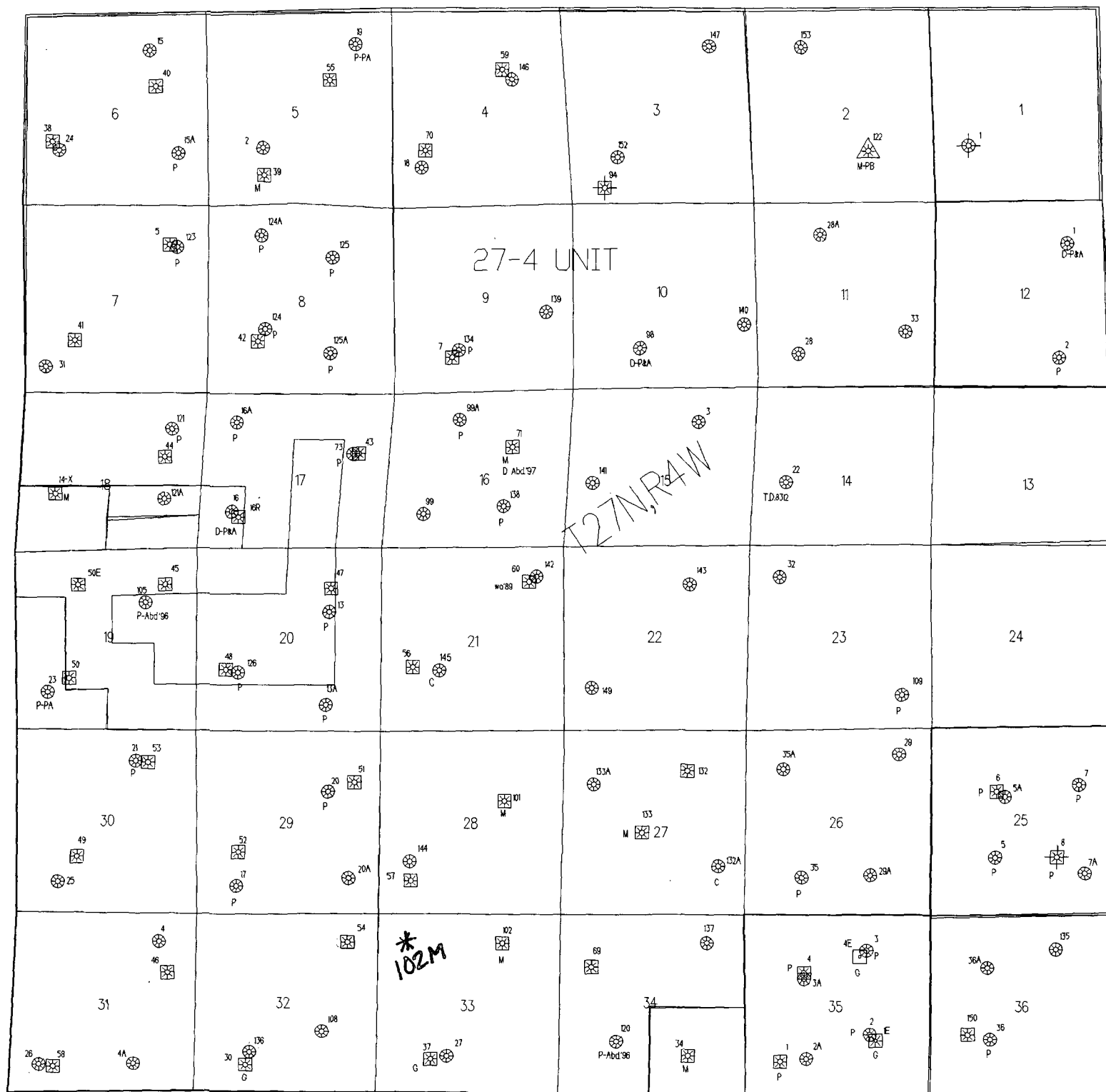
01/07/80	1170.0	- original
01/14/80	1171.0	
07/07/80	831.0	
11/05/81	691.0	
11/05/82	670.0	
05/18/84	724.0	
11/03/86	602.0	
09/11/89	603.0	
09/18/91	797.0	
11/18/91	785.0	
07/30/93	574.0	- current

San Juan 27-4 Unit #102M

Mesaverde Offset



San Juan 27-4 Unit #102M  
Blanco Mesaverde/ Basin Dakota  
27N-4W-33P



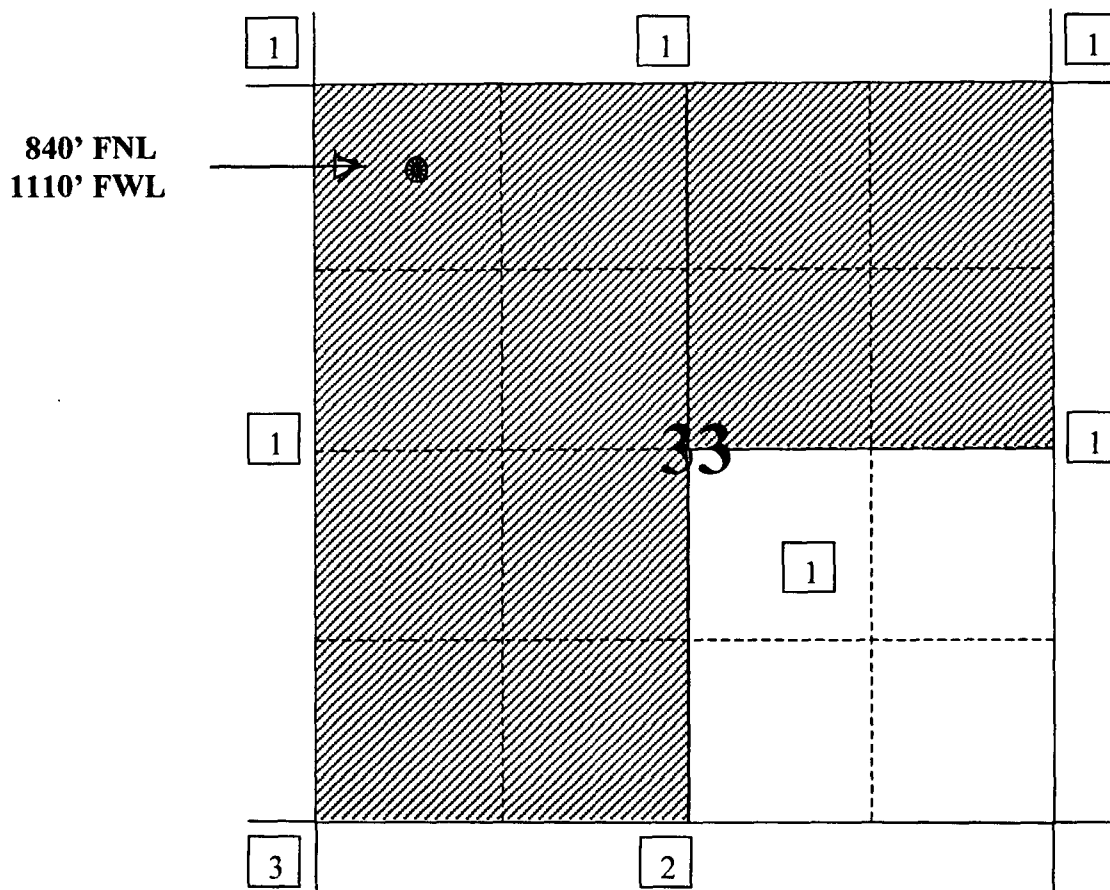
***BURLINGTON RESOURCES OIL AND GAS COMPANY***

**San Juan 27-4 Unit #102M**

**OFFSET OPERATOR/OWNER PLAT**

**Mesaverde (W/2) / Dakota (N/2) Formations Commingle Well**

**Township 27 North, Range 4 West**



- 1) Burlington Resources
- 2) Amoco Production Company  
Attn: Steve Trefz  
P.O. Box 800  
1670 Broadway  
Denver, CO 80201
- 3) Chateau Oil & Gas, Inc.  
5950 Berkshire Lane, Ste 275  
Dallas, TX 75225