

**Stogner, Michael, EMNRD**

**From:** Stogner, Michael, EMNRD  
**To:** Jim Bruce  
**Cc:** Arrant, Bryan, EMNRD; bglasscock@basspet.com  
**Subject:** RE: Big Eddy Unit #153 (Sec.20, T21S-R29E)  
**Attachments:**

**Sent:** Thu 2/23/2006 1:14 PM

Subsequent to Mr. Arrant's e-mail message of 2/9/2006, Mr. Bruce filed an administrative application (received by the Division on 2/22/2006) pursuant to Division Rules 104.C (2) (a) and 111.A (13) for an unorthodox subsurface gas well location/producing area for this well (API No. 30-01534012). I have also reviewed the Division's computerized records for this well.

I'm a little confused as to the current status of this well. From these three sources of information I find that:

- (1) the APD dated 3/16/2005 indicates this well is to be drilled to TD at 13,100' as a conventional straight hole to test the Golden Lane-Morrow Gas Pool (77560);
- (2) on 2/9/2006 "this well is to be shut-in" (see Mr. Arrant's e-mail);
- (3) 3,412 MCF of gas from the Golden Lane-Morrow Gas Pool was reported for this well in December, 2005;
- (4) a Sundry Notice of Subsequent Report dated 12/8/2005 shows this well was spud on 9/17/2005;
- (5) a Sundry Notice of Intent dated 12/21/2005 indicates that Bass is planning to lateral drill from a KOP of 12,263' MD to a BHL 2383' FSL & 567' FEL (Unit I) of Section 20;
- (6) another Sundry Notice of Intent dated 2/9/2006 amended these plans with a KOP of 12,271' MD to a BHL 2587' FNL & 414' FEL (Unit H) of Section 20; and
- (7) Mr. Bruce's application in future tense ("the well will be drilled" and "applicant desires to drill a lengthy horizontal wellbore").

What is going on with this well? Details please.

**From:** Arrant, Bryan, EMNRD  
**Sent:** Thu 2/9/2006 1:23 PM  
**To:** Brad Glasscock  
**Cc:** Gum, Tim, EMNRD; Sanchez, Daniel J., EMNRD; Stogner, Michael, EMNRD  
**Subject:** RE: Big Eddy Unit #153 (Sec.20, T21S-R29E)

*2-23 (3:23pm)  
 Jim Bruce left a voicemail  
 message in response;  
 will amend filing  
 M.S.*

Brad,

Please be informed that this well is to be shut-in today (February 9, 2006) until an approved NSL is granted from Santa Fe. Please review NMOC Rule 19.15.3.104(C)(2) for more information.

Also, please be aware that whenever a well is directionally drilled that we are provided the correct bottom hole location.

Yours Truly,

Bryan Arrant  
 PES 505-748-1283.103

CC: Daniel Sanchez-Enforcement & Compliance Manager  
 Tim Gum-District II Supervisor  
 Michael Stogner-NSL Approval

-----Original Message-----

From: Brad Glasscock [mailto:bglasscock@basspet.com]

Sent: Thursday, February 09, 2006 12:26 PM

To: Arrant, Bryan, EMNRD

Cc: wayne Bailey

Subject: Big Eddy Unit #153 (Sec.20, T21S-R29E)

Bryan,

This email is being sent to verify that Bass owns all the leases directly offsetting the proposed Big Eddy Unit #153. Please call and let me know if there is any other information you need in regards to this well.

Thanks,

Brad Glasscock

Landman

Bass Enterprises Production Co.

(817) 339-7185

**JAMES BRUCE**  
ATTORNEY AT LAW

POST OFFICE BOX 1056  
SANTA FE, NEW MEXICO 87504

369 MONTEZUMA, NO. 213  
SANTA FE, NEW MEXICO 87501

(505) 982-2043 (Phone)  
(505) 660-6612 (Cell)  
(505) 982-2151 (Fax)

[jamesbruc@aol.com](mailto:jamesbruc@aol.com)

2006 MAR 3 PM 12 45

March 3, 2006

Hand delivered

Michael E. Stogner  
Oil Conservation Division  
1220 South St. Francis Drive  
Santa Fe, New Mexico 87505

Re: Amended NSL Application/response to your e-mail of 2/23/06

Dear Mr. Stogner:

Pursuant to Division Rule 104.F(2), Bass Enterprises Production Co. applies for approval of an unorthodox gas well location for the following well:

|                          |  |
|--------------------------|--|
| <u>Well:</u>             | Big Eddy Unit Well No. 153 (API No. 30-015-34012)  |
| <u>Surface location:</u> | 660 feet FSL & 1980 feet FEL   |
| <u>Well unit:</u>        | E½ of Section 20, Township 21 South, Range 29 East,<br>N.M.P.M., Eddy County, New Mexico |

Applicant applies for two unorthodox locations for the same well, as follows:

1. The well was drilled in late 2005, at the above surface location, as a vertical well. The well was drilled to a depth sufficient to test the Morrow formation (Golden Lane-Morrow Gas pool). The Morrow formation is developed on statewide rules, with 320 acre spacing, and wells to be located no closer than 660 feet to a quarter section line, nor closer than 10 feet to a quarter-quarter section line.

Per the deviation plat attached as Exhibit A, the well unintentionally deviated during drilling, to the following unorthodox bottomhole location:

|                             |                              |
|-----------------------------|------------------------------|
| <u>Bottomhole location:</u> | 697 feet FSL & 2107 feet FEL |
|-----------------------------|------------------------------|

The vertical well has been completed in the Morrow formation, with perforations at 12,538-12,638 feet subsurface, and is capable of producing. It is now shut-in.

2. Because the well is not a prolific producer, applicant decided to drill the well directionally to further test the Morrow formation. The initial terminus of the well was to have been 2383 feet FSL and 567 feet FEL of Section 20. Applicant subsequently decided to extend the horizontal wellbore, and the proposed terminus of the well is now as follows:

Bottomhole location (terminus): 2587.17 feet FNL & 414.36 feet FEL

A Sundry Notice and Form C-102 for the well, with the final terminus point, are attached as Exhibit B. The well will be directionally drilled under Division Rule 111. **The ~~vertical~~ wellbore has not been commenced.**

*horizontal*

Attached as Exhibit C is geological data on the Morrow formation. Applicant desires to drill the horizontal wellbore to test several Middle Morrow zones, at different structural levels. The length of the wellbore is necessary to adequately test all prospective zones, causing the terminus of the lateral to be slightly unorthodox toward the east.

After the horizontal well is drilled, applicant plans on producing the current perforations in the vertical wellbore, and the horizontal wellbore.

Attached as Exhibits D and E are a land plat and ownership information from the Unit Agreement for the Big Eddy Unit. The color code on Exhibit D is as follows:

Green: Acreage in E½ of Section 20 (the well unit);

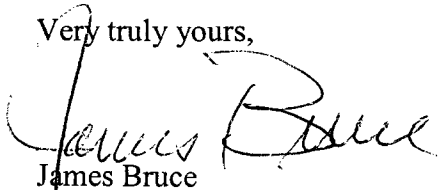
Orange: Acreage in W½ of Section 20 and W½ of Section 29 (offsetting the unorthodox vertical wellbore); and

Yellow: Acreage in W½ of Section 21 (offsetting the horizontal wellbore).

All of the offsetting (federal) leases are fully committed to the Big Eddy Unit, and ownership is common. Therefore, there is no adversely affected interest owner who needs to be notified of this application.

Please contact me if you need any further information on this application.

Very truly yours,

  
James Bruce

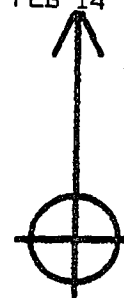
Attorney for Bass Enterprises Production Co.



**Scientific  
Drilling**

Field: Golden Lane (Morrow)  
 Site: Eddy County, NM  
 Well: Big Eddy #153  
 Wellpath: VH - Job #32K0905698  
 Survey: 11/12/05

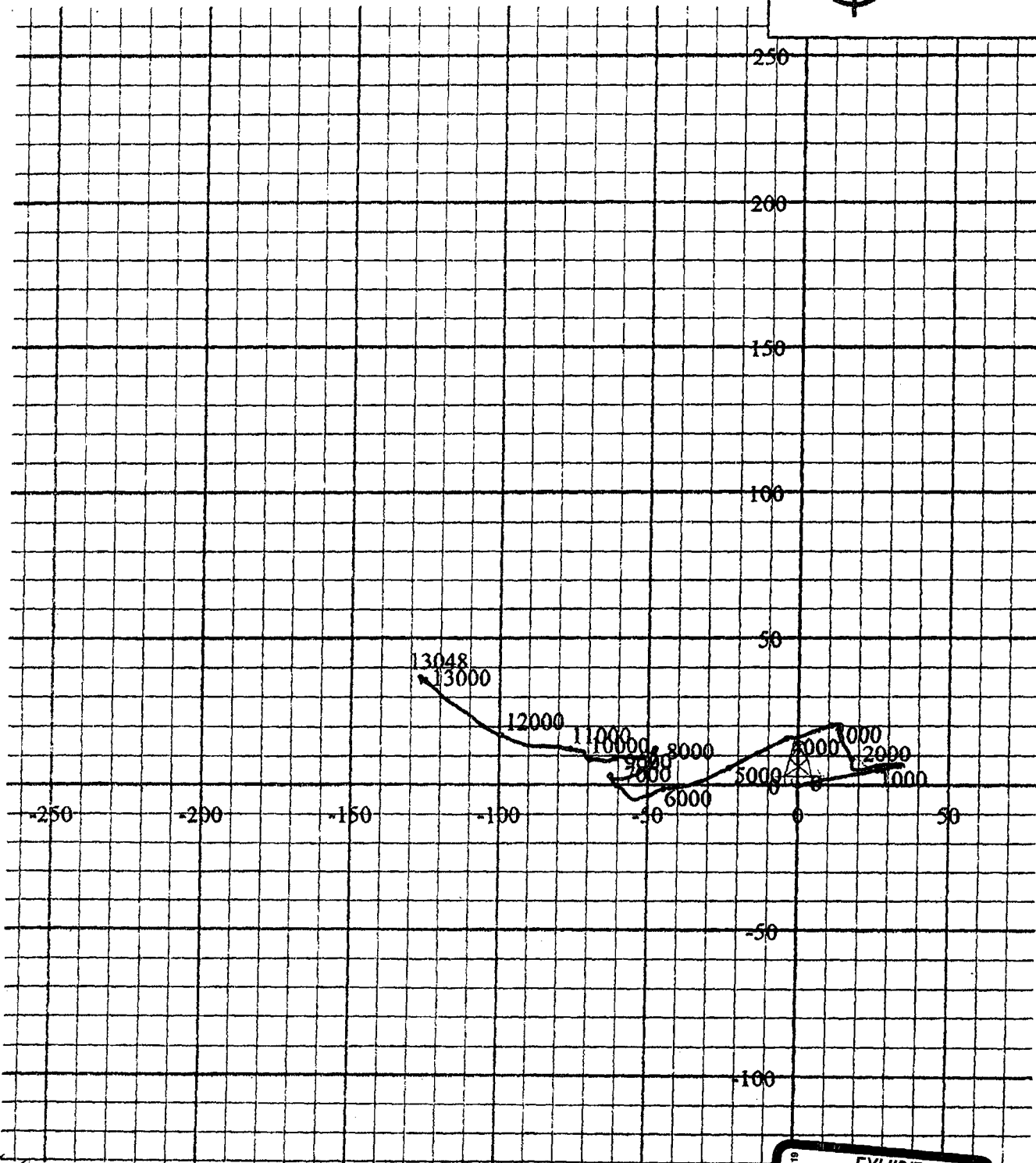
FEB 14 '06 11:13AM



Azimuths to Grid North  
 True North: 0.00°  
 Magnetic North: 0.00°

Magnetic Field  
 Strength: 0nT  
 Dip Angle: 0.00°  
 Date: 10/16/2005  
 Model: igrf2000

South(-)/North(+) [50ft/in]



\*for drilling  
 FHL 697 FSL  
 2107 FEL

West(-)/East(+) [50ft/in]



too close to interior line, so needs admin. approval for NSL

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT

FORM APPROVED  
OM B No. 1004-0137  
Expires: March 31, 2007

**SUNDRY NOTICES AND REPORTS ON WELLS**

Do not use this form for proposals to drill or to re-enter an abandoned well. Use Form 3160-3 (APD) for such proposals.

**SUBMIT IN TRIPLICATE - Other instructions on reverse side.**

1. Type of Well  
☒ Oil Well ☐ Gas Well ☐ Other

2. Name of Operator  
Bass Enterprises Production Co.

3a. Address P. O. Box 2760 Midland TX 79702  
3b. Phone No. (include area code) (432) 683-2277

4. Location of Well (Footage, Sec., T., R., M., or Survey Description)  
SWSE 660' FSL & 1980' FEL, Section 20, T21S, R29E  
Lat - 32.273410 deg, Long 104.001640 deg

5. Lease Serial No.

NMNM04228

6. If Indian, Allottee or Tribe Name

7. If Unit or CA/Agreement, Name and/or No.

NMNM68294X

8. Well Name and No.

Big Eddy Unit #153

9. API Well No.

30-015-34012

10. Field and Pool, or Exploratory Area

Golden Lane - Morrow

11. County or Parish, State

Eddy  
New Mexico

**12. CHECK APPROPRIATE BOX(ES) 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"/> Acidize                 | <input type="checkbox"/> Deepen           | <input type="checkbox"/> Production (Start/Resume) | <input type="checkbox"/> Water Shut-Off           |
| <input type="checkbox"/> Subsequent Report           | <input type="checkbox"/> Alter Casing            | <input type="checkbox"/> Fracture Treat   | <input type="checkbox"/> Reclamation               | <input type="checkbox"/> Well Integrity           |
| <input type="checkbox"/> Final Abandonment Notice    | <input type="checkbox"/> Casing Repair           | <input type="checkbox"/> New Construction | <input type="checkbox"/> Recomplete                | <input checked="" type="checkbox"/> Other Planned |
|  | <input checked="" type="checkbox"/> Change Plans | <input type="checkbox"/> Plug and Abandon | <input type="checkbox"/> Temporarily Abandon       | <u>Lateral Drilg</u>                              |
|  | <input type="checkbox"/> Convert to Injection    | <input type="checkbox"/> Plug Back        | <input type="checkbox"/> Water Disposal            |   |

13. Describe Proposed or Completed Operation (clearly state all pertinent details, including estimated starting date of any proposed work and approximate duration thereof. If the proposal is to deepen directionally or recomplete horizontally, give subsurface locations and measured and true vertical depths of all pertinent markers and zones. Attach the Bond under which the work will be performed or provide the Bond No. on file with BLM/BIA. Required subsequent reports shall be filed within 30 days following completion of the involved operations. If the operation results in a multiple completion or recompletion in a new interval, a Form 3160-4 shall be filed once testing has been completed. Final Abandonment Notices shall be filed only after all requirements, including reclamation, have been completed, and the operator has determined that the site is ready for final inspection.)

Bass Enterprises Production Co. wishes to alter our original directional plan, thus changing the bottom hole location.  
Planned lateral: KOP 12,263' MD, 12,259' TVD and EOL 14,706' MD, 12,673' TVD.  
Original BHL was to be located at 2383' FSL & 567' FEL, Sec 20, T21S, R29E.  
Total displacement would have been 2,272' at an azimuth at N 40 deg E.

Current Planned Lateral: KOP 12,271' MD, 12,267' TVD and EOL 14,976' MD, 12,585' TVD.

BHL (Base of pay) at 2,595.66' FSL & 478.55' FEL of Section 20, T21S, R29E.  
TD (end of lateral) will be located at 2,587.17' FNL & 414.36' FEL of Section 20, T21S, R29E.

Total displacement will now be 2,549.49' at an azimuth of N40 deg E (from kickoff point).

14. I hereby certify that the foregoing is true and correct  
Name (Printed/Typed)

Annette Childers

Title Administrative Assistant

Signature

*Annette Childers*

Date 02/09/2006

**THIS SPACE FOR FEDERAL OR STATE OFFICE USE**

Approved by

Conditions of approval, if any, are attached. Approval of this notice 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.

Title

Date

Office

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

(Instructions on page 2)



1625 N. French Dr., Hobbs, NM 88240

## DISTRICT II

811 South First, Artesia, NM 88210

### DISTRICT III

1000 Rio Brazos Rd., Aztec, NM 87410

## DISTRICT IV

2040 South Pacheco, Santa Fe, NM 87505

State of New Mexico

**Energy, Minerals and Natural Resources Department**

Form C-102  
Revised March 17, 1989

**Submit to Appropriate District Office**

State Lease - 4 Copies

Fee Lease - 3 Copies

## OIL CONSERVATION DIVISION

2040 South Pacheco

Santa Fe, New Mexico 87504-2088

☐ AMENDED REPORT

# WELL LOCATION AND ACREAGE DEDICATION PLAT

|                            |  |                                  |
|----------------------------|--|----------------------------------|
| API Number<br>30-015-34012 | Pool Code<br>77560                                   | Pool Name<br>GOLDEN LANE(MORROW) |
| Property Code              | Property Name<br>BIG EDDY UNIT                       | Well Number<br>153               |
| OGRID No.<br>001801        | Operator Name<br>BASS ENTERPRISES PRODUCTION COMPANY | Elevation<br>3313'               |

### Surface Location

| UL or lot No. | Section | Township | Range | Lot Idn | Feet from the | North/South line | Feet from the | East/West line | County |
|---------------|---------|----------|-------|---------|---------------|------------------|---------------|----------------|--------|
| 0             | 20      | 21 S     | 29 E  |         | 660           | SOUTH            | 1980          | EAST           | EDDY   |

**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 |
|---------------|---------|----------|-------|---------|---------------|------------------|---------------|----------------|--------|
| H             | 20      | 21 S     | 29 E  |         | 2587.17       | NORTH            | 414.36        | EAST           | EDDY   |

| Dedicated Acres | Joint or Infill | Consolidation Code | Order No. |
|-----------------|-----------------|--------------------|-----------|
|                 |                 |                    |           |

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

NW CORNER  
N 535635.859  
E 639386.446

320.8 ACRES - GLO

I.D.  
LAT - N32°27'53.963"  
LONG - W103°59'58.059"  
NMSPCE- N 533056.28  
(NAD 83) E 644309.82

K.O.P.  
LAT - N32°27'34.310"  
LONG - W104°00'17.840"  
NMSPCE- N 531065.02  
(NAD 83) E 642638.55

160.36 ACRES - GLO

SURFACE LOC.  
LAT - N32°27'34.100"  
LONG - W104°00'18.400"  
NMSPCE- N 531044.15  
(NAD 83) E 642744.18

SW CORNER  
N 530379.252  
E 639436.631

PROPOSED BOTTOM HOLE  
LAT - N32°27'53.208"  
LONG - W103°59'58.811"  
NMSPCE- N 532979.81  
(NAD 83) E 644245.63

414.35'  
478.55'

P.B.H.

T.O.

2597.17'

2595.66'

3309.0'

3323.4'

2085.73'

1980'

3312.1'

3320.0'

NE CORNER  
N 534106.631  
E 644309.82

SE CORNER  
N 530379.252  
E 639436.631

OPERATOR CERTIFICATION

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

Signature \_\_\_\_\_  
W.R. DANNELS  
Printed Name \_\_\_\_\_  
DIVISION DRILLING SUPT.  
Title \_\_\_\_\_  
Date \_\_\_\_\_

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 belief.

JANUARY 21, 2005

Date Surveyed \_\_\_\_\_  
Signature & Seal of Professional Surveyor \_\_\_\_\_  
W.O. No. 4996  
Certificate No. Gary Jones 7977  
BASIN SURVEYS

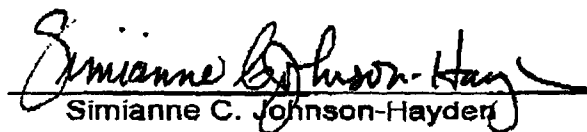
# Memorandum

**To:** George A. Hillis  
**From:** Simianne C. Johnson-Hayden  
**Date:** January 25, 2006  
**Re:** BEU 153 – Lateral 1  
Geological Structure – Middle Morrow

---

Attached please information provided to assist drilling/engineering in their final plans for the Big Eddy Unit No. 153 Lateral 1. A Top of the Lower Morrow structure map posting the proposed wellbore path for Lateral 1, and a wellbore stick-section of BEU No. 153 Vertical and Lateral 1 "end point" are presented for review.

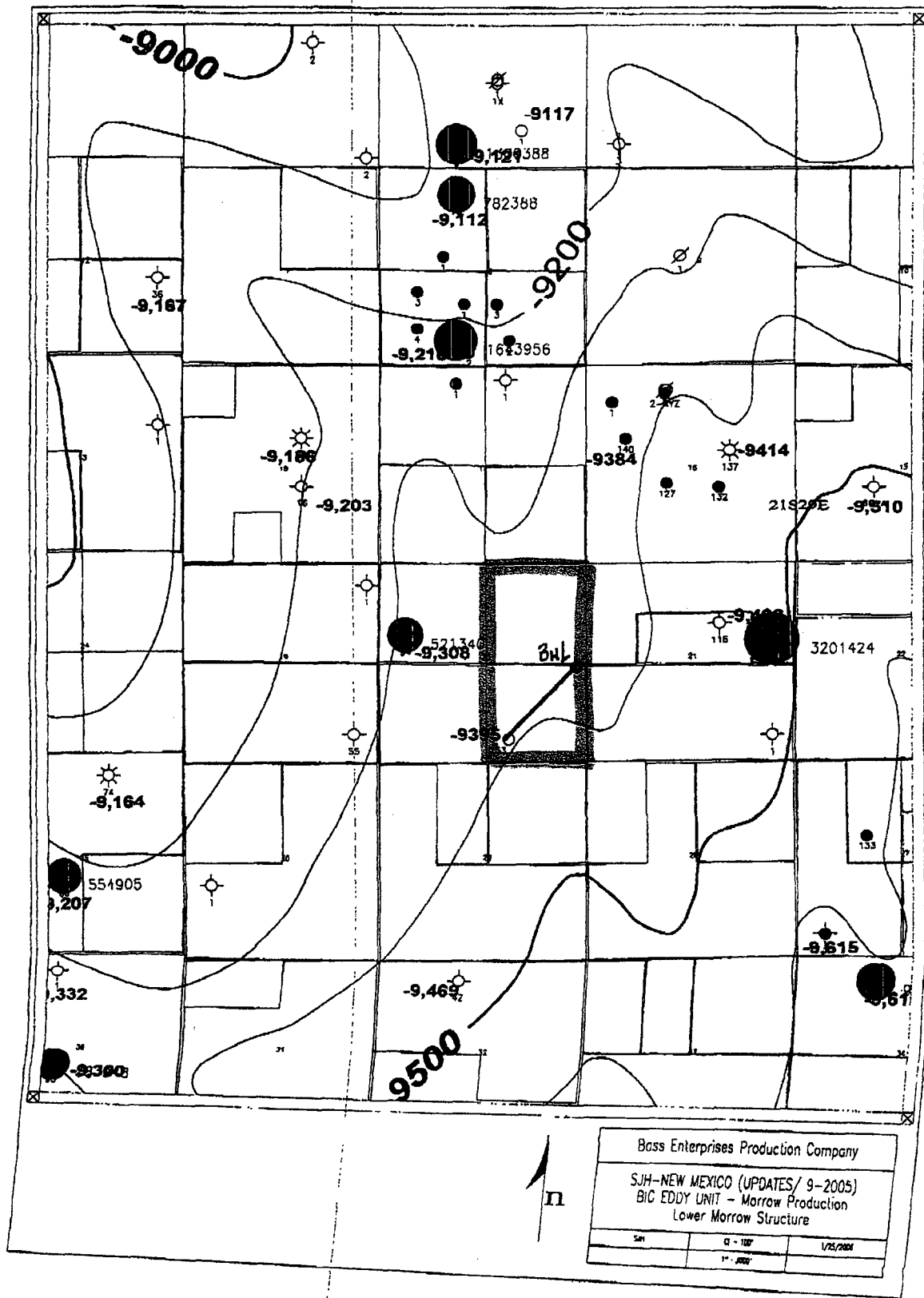
The stick-section illustrates the anticipated structural and stratigraphic relationship between the vertical well and the terminus of the 2500' Lateral 1. Middle Morrow Sand tops are provided in Measured and Subsea Depths for the Vertical well with the correlative estimated tops on Lateral 1 provided in True Vertical Subsea Depth. This data is estimated based on a N 40° E wellbore trajectory.

  
Simianne C. Johnson-Hayden



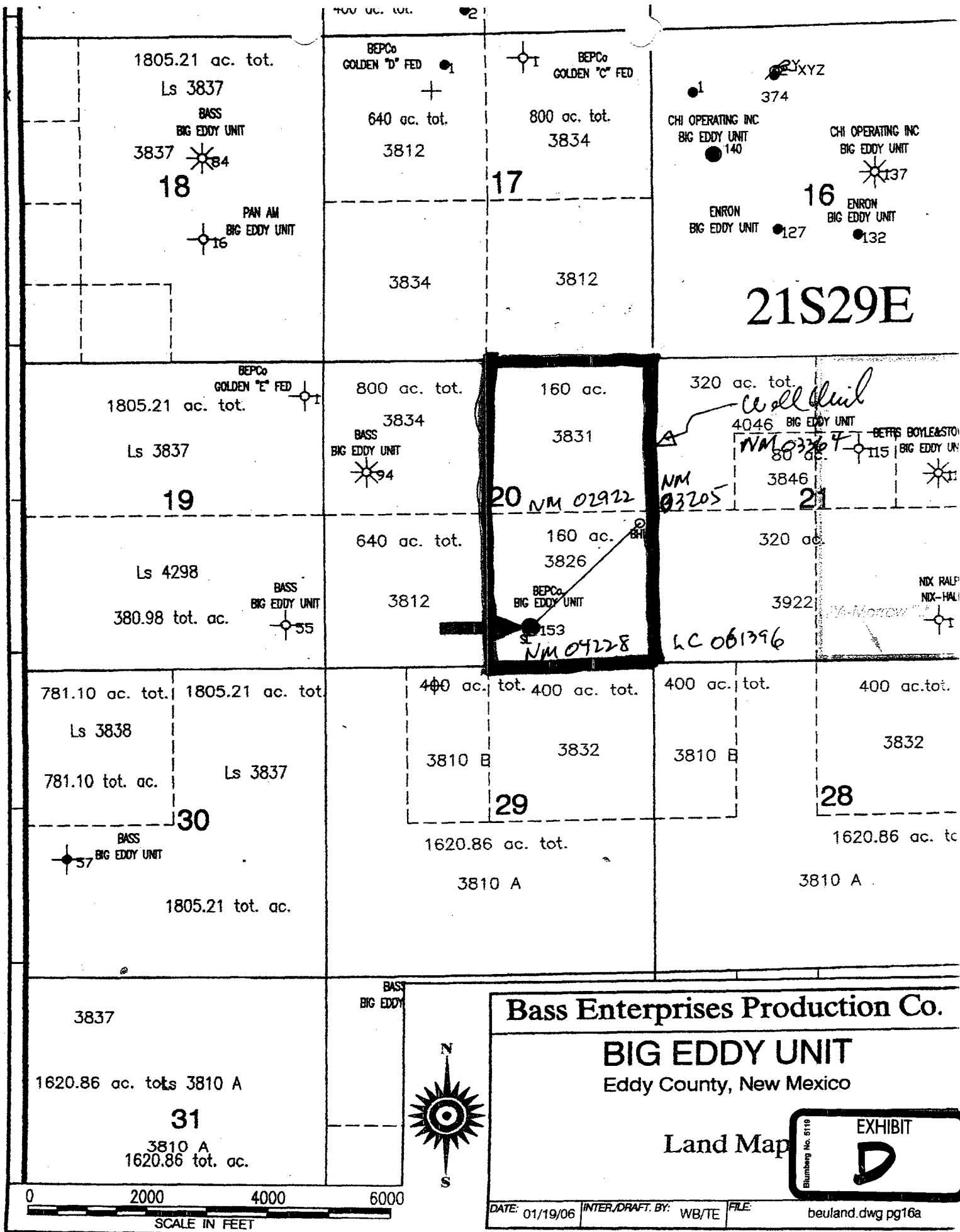






P.S/S

JAN 30 '06 09:16AM BASS LAND DEPT.



Revised Jan. 15, 1961

EXHIBIT 7

BIG EDDY UNIT AREA, EDDY AND LEA COUNTIES, NEW MEXICO

TWPS. 19, 20, 21, 22 and 23, S. 1, R. 28S, 28, 29, 30, 31 and 32 E., N.M.P.M.

SCHEDULE SHOWING THE PERCENTAGE AND KIND OF OWNERSHIP OF OIL AND GAS INTERESTS

IN ALL LANDS IN THE UNIT AREA

RECEIVED  
STATE LAND OFFICE  
SANTA FE, N. M.

1961 MAR 21 AM 10 02

| Tract No.           | Description of Land   | No. of Acres | Application or Sec. No. & Effective Date | Basis Royalty & Percentage | Lessee of Record   | Overriding Royalty & Percentage   | Working Interest Owner & Percentage  |
|---------------------|---|--------------|--|----------------------------|--|---|--|
| <b>FEDERAL LAND</b> |   |              |  |                            |  |   |  |
| 1.                  | T-20-S, R-31-E<br>Sec. 5: S <sub>1/2</sub><br>Sec. 6: S <sub>1/2</sub><br>Sec. 7: E <sub>1/2</sub><br>Sec. 8: All<br>Sec. 9: W <sub>1/2</sub> | 1600         | NM 0251<br>7-1-52                        | USA All                    | S. W. Richardson<br>& Perry R. Bass  | Bertrand O. Eastz<br>Obligation \$500 per acre<br>out of 3% of production | S. W. Richardson<br>& Perry R. Bass  |
| 2-A                 | T-21-S, R-30-E<br>Sec. 3: Lots 1, 2, 7, 8, 9,<br>10, 15 & 16, S <sub>1/2</sub>  | 471.70       | NM 0299-A<br>7-1-51                      | USA All                    | S. W. Richardson<br>& Perry R. Bass  | Thelma L. Rhodes 3%   | S. W. Richardson<br>& Perry R. Bass  |
| 2-B                 | T-21-S, R-30-E<br>Sec. 14: S <sub>1/2</sub> NW <sub>1/4</sub>   | 140          | NM 0299<br>7-1-51                        | USA All                    | J. W. Owen   | None  | O. Z. Bradley  |
| 3.                  | T-21-S, R-28-E<br>Secs. 21, 22, 27 & 28 All   | 2560         | NM 0486<br>11-1-51                       | USA All                    | S. W. Richardson<br>& Perry R. Bass  | Jerry Curtis 5%   | S. W. Richardson<br>& Perry R. Bass  |
| 4.                  | T-21-S, R-29-E<br>Sec. 8: NW <sub>1/4</sub><br>Sec. 10: W <sub>1/2</sub> NW <sub>1/4</sub> , S <sub>1/2</sub>                                 | 1400         | NM 0505<br>2-1-50                        | USA All                    | S. W. Richardson<br>& Perry R. Bass  | Marian D. Harris 3%   | S. W. Richardson<br>& Perry R. Bass  |
| 5.                  | T-21-S, R-29-E<br>Sec. 8: S <sub>1/2</sub><br>Sec. 17: NW <sub>1/4</sub> , S <sub>1/2</sub><br>Sec. 20: S <sub>1/2</sub>                      | 640          | NM 0509<br>2-1-50                        | USA All                    | S. W. Richardson<br>& Perry R. Bass  | Marian D. Harris 3%   | S. W. Richardson<br>& Perry R. Bass  |
| 6.                  | T-20-S, R-31-E<br>Sec. 11: NW <sub>1/4</sub>  | 160          | NM 0783<br>6-1-50                        | USA All                    | E. A. Culbertson<br>Wallace W. Irwin<br>Hondo Oil & Gas Co.<br>So. California Petrol.<br>eum Co. | Amy McMurtt 1/8<br>1/8<br>1/8<br>1/8<br>1/4                               | E. A. Culbertson<br>& Wallace W. Irwin<br>Hondo Oil & Gas Co.<br>So. California Petrol.<br>eum Co. |

Blumberg No. 5110

EXHIBIT

7

21. T-21-S, R-29-E  
Sec. 10: NW 1/4  
Sec. 8: NW 1/4  
Sec. 17: NW 1/4, SW 1/4  
Sec. 20: NW 1/4

22. T-21-S, R-29-E  
Sec. 20: NW 1/4

23. T-21-S, R-29-E  
Sec. 8: SW 1/4  
Sec. 10: E 1/2 NW 1/4, SW 1/4

24. T-21-S, R-30-E  
Sec. 15: NW 1/4

25. T-21-S, R-30-E  
Sec. 15: NW 1/4

26. T-21-S, R-30-E  
Sec. 10: SW 1/4

27. T-21-S, R-30-E  
Sec. 10: NW 1/4

28. T-21-S, R-31-E  
Sec. 6: Lots 9, 10, 15, 16

29. T-21-S, R-31-E  
Sec. 6: Lots 11, 12, 13, 14

30. T-21-S, R-31-E  
Sec. 3: Lots 3, 4, 5, 6  
Sec. 4: Lots 3, 4, 5, 6

31. T-21-S, R-29-E  
Sec. 21: NW 1/4, SW 1/4, NE 1/4, SW 1/4  
Sec. 33: E 1/2 NW 1/4

32. T-21-S, R-30-E  
Sec. 29: NW 1/4, NE 1/4, SW 1/4, SE 1/4

| Acres  | Section              | Owner                               | USA All | State   | County   | Notes   |
|--------|----------------------|-------------------------------------|---------|---------|--|---|
| 300    | NM 02918<br>2-1-50   | S. W. Richardson<br>& Perry R. Bass | USA All | USA All | Josephine Rodde.<br>Marian D. Harris                                     | 1 1/2 S. W. Richardson<br>2 1/2 & Perry R. Bass |
| 160    | NM 02922<br>2-1-50   | S. W. Richardson<br>& Perry R. Bass | USA All | USA All | Joe W. Lackey<br>Marian D. Harris  | 2 1/2 S. W. Richardson<br>2 1/2 & Perry R. Bass |
| 100    | NM 02916<br>2-1-50   | S. W. Richardson<br>& Perry R. Bass | USA All | USA All | Marian D. Harris<br>Frances Mix  | 2 1/2 S. W. Richardson<br>1 1/2 & Perry R. Bass |
| 160    | NM 02977<br>10-1-48  | S. W. Richardson<br>& Perry R. Bass | USA All | USA All | LaVerge Harris<br>I. W. Rosworth   | 1 1/2 S. W. Richardson<br>2 1/2 & Perry R. Bass |
| 320    | NM 055038<br>2-1-60  | Frank Yates                         | USA All | USA All | None   | Frank Yates                                     |
| 160    | NM 02979<br>10-1-48  | S. W. Richardson<br>& Perry R. Bass | USA All | USA All | LaVerge Harris   | 1 1/2 S. W. Richardson<br>& Perry R. Bass       |
| 160    | NM 02980<br>10-1-48  | S. W. Richardson<br>& Perry R. Bass | USA All | USA All | LaVerge Harris   | 1 1/2 S. W. Richardson<br>& Perry R. Bass       |
| 160    | NM 03057<br>9-1-48   | S. W. Richardson<br>& Perry R. Bass | USA All | USA All | Wm. R. Thompson  | 1 1/2 S. W. Richardson<br>& Perry R. Bass       |
| 156.39 | NM 03059<br>9-1-48   | S. W. Richardson<br>& Perry R. Bass | USA All | USA All | Wm. R. Thompson  | 1 1/2 S. W. Richardson<br>& Perry R. Bass       |
| 329.04 | NM 03183<br>3-1-52   | S. W. Richardson<br>& Perry R. Bass | USA All | USA All | Mary Didlake,<br>Obligation \$500 per acre<br>out of 3 1/2 of production | S. W. Richardson<br>& Perry R. Bass             |
| 320    | NM 03205<br>2-1-50   | S. W. Richardson<br>& Perry R. Bass | USA All | USA All | John S. Harris<br>Ralph Mix  | 2 1/2 S. W. Richardson<br>1 1/2 & Perry R. Bass |
| 600    | NM 03297-B<br>4-1-52 | S. W. Richardson<br>& Perry R. Bass | USA All | USA All | Lucy English   | 3 1/2 S. W. Richardson<br>& Perry R. Bass       |

|     |   |         |                      |         |                                       |  |          |                                     |
|-----|---|---------|----------------------|---------|---------------------------------------|--|----------|-------------------------------------|
| 33. | T-22-S, R-29-E<br>Sec. 5: Lots 1, 2, 3, 4, SW <sup>1</sup><br>Sec. 6: Lots 1, 2, 3, 4, NW <sup>1</sup> , NE <sup>1</sup><br>Sec. 7: Lots 1, 2, 3, 4, SE <sup>1</sup><br>Sec. 18: Lots 1, 2, 3, 4, E <sup>1</sup> W <sup>1</sup>                   | 1140.60 | NM 03302<br>9-1-51   | USA All | S. W. Richardson<br>& Perry R. Bass   | Book Russell   | 3%       | S. W. Richardson<br>& Perry R. Bass |
| 34. | T-21-S, R-29-E<br>Sec. 21: SW <sup>1</sup> NW <sup>1</sup> , SW <sup>1</sup> NE <sup>1</sup>  | 80      | NM 03364<br>2-1-50   | USA All | S. W. Richardson<br>& Perry R. Bass   | John S. Harris<br>Joe W. Lackey  | 2%       | S. W. Richardson<br>& Perry R. Bass |
| 35. | T-21-S, R-28-E<br>Sec. 3: Lots 1, 2, 7, 8, 9,<br>10, 11   | 253.96  | NM 03926<br>6-1-52   | USA All | S. W. Richardson<br>& Perry R. Bass   | None   |          | S. W. Richardson<br>& Perry R. Bass |
| 36. | T-20-S, R-21-E<br>Sec. 17: SW <sup>1</sup> , SE <sup>1</sup><br>Sec. 21: NW <sup>1</sup> , NE <sup>1</sup><br>Sec. 27: NE <sup>1</sup> NW <sup>1</sup>  | 1040    | NM 04082<br>12-1-51  | USA All | S. W. Richardson<br>& Perry R. Bass * | Victor B. VanHook  | 3.125%   | S. W. Richardson<br>& Perry R. Bass |
| 37. | T-21-S, R-30-E<br>Sec. 19: Lots 5, 6, 7, 8,<br>Sec. 20: SW <sup>1</sup> , NW <sup>1</sup> , SE <sup>1</sup><br>Sec. 29: SW <sup>1</sup> NW <sup>1</sup><br>Sec. 30: All<br>Sec. 21: SW <sup>1</sup><br>T-21-S, R-29-E<br>Sec. 20: SW <sup>1</sup> | 1197.71 | NM 04105<br>3-1-52   | USA All | S. W. Richardson<br>& Perry R. Bass   | None   |          | S. W. Richardson<br>& Perry R. Bass |
| 38. | T-21-S, R-29-E<br>Sec. 20: SW <sup>1</sup>  | 160     | NM 04228<br>2-1-50   | USA All | S. W. Richardson<br>& Perry R. Bass   | Marian D. Harris<br>Marian Blomberg                                      | 2%<br>1% | S. W. Richardson<br>& Perry R. Bass |
| 39. | T-21-S, R-31-E<br>Sec. 3: Lots 1, 2, 7, 8, 9,<br>10, 11, 12, 13, 14, 15, 16<br>Sec. 4: Lots 1, 2, 7, 8, 11,<br>12, 13, 14, SW <sup>1</sup><br>Sec. 9: SE <sup>1</sup> , SW <sup>1</sup>   | 1149.20 | NM 04383-A<br>7-1-52 | USA All | S. W. Richardson<br>& Perry R. Bass   | Manley O. Vandoradol   | 3%       | S. W. Richardson<br>& Perry R. Bass |
| 40. | T-20-S, R-31-E<br>Sec. 3: Lot 1, SW <sup>1</sup> NW <sup>1</sup> ,<br>SW <sup>1</sup> SE <sup>1</sup><br>Sec. 4: Lots 1, 2, 3, SW <sup>1</sup> NW <sup>1</sup> ,<br>SW <sup>1</sup> SE <sup>1</sup>   | 552.10  | NM 04557<br>8-1-52   | USA All | S. W. Richardson<br>& Perry R. Bass   | Frances M. Price<br>Obligation \$500 per acre<br>out of 3% of production |          | S. W. Richardson<br>& Perry R. Bass |
| 41. | T-21-S, R-31-E<br>Sec. 4: Lots 9, 10, 15, 16,<br>SW <sup>1</sup>  | 320     | NM 04835-A<br>6-1-52 | USA All | S. W. Richardson<br>& Perry R. Bass   | Elizabeth Ann Elliott  | 3%       | S. W. Richardson<br>& Perry R. Bass |

\* Operating Agreements dated Feb. 23, 1960 granted Shell Oil Co and Texas Crude Oil Co. on rights above 7456 feet on W<sup>1</sup> and W<sup>2</sup> Sec. 21 and 6.25% overriding royalty retained.

| No. | T-22-S, R-28-E  | 1156.51' | IC 060613<br>9-1-48   | USA All | S. W. Richardson<br>& Perry R. Bass | Lillie May Yates              | 5%   | S. W. Richardson<br>& Perry R. Bass |
|-----|---|----------|-----------------------|---------|-------------------------------------|-------------------------------|------|-------------------------------------|
| 47. | Sec. 4: Lots 1, 2, SW <sup>1/4</sup> , SW <sup>1/4</sup><br>Sec. 5: Lots 2, 3, SW <sup>1/4</sup> , NW <sup>1/4</sup><br>Sec. 6: SW <sup>1/4</sup> , SW <sup>1/4</sup><br>Sec. 9: NW <sup>1/4</sup><br>Sec. 10: NW <sup>1/4</sup>  | 1479.16  | IC 060853-A<br>8-1-49 | USA All | S. W. Richardson<br>& Perry R. Bass | J. E. Metcalf                 | 5%   | S. W. Richardson<br>& Perry R. Bass |
| 48. | T-22-S, R-28-E<br>Sec. 3: Lots 3, 4, S <sup>1/2</sup> , S <sup>1/2</sup><br>Sec. 4: Lots 3, 4, S <sup>1/2</sup> , S <sup>1/2</sup><br>Sec. 5: Lots 1, 4, SW <sup>1/4</sup> , NW <sup>1/4</sup><br>Sec. 6: SW <sup>1/4</sup> , SW <sup>1/4</sup><br>Sec. 9: NW <sup>1/4</sup><br>Sec. 10: NW <sup>1/4</sup>                            | 195.08   | IC 061277<br>5-1-50   | USA All | S. W. Richardson<br>& Perry R. Bass | Martin Yates III              | 5%   | S. W. Richardson<br>& Perry R. Bass |
| 49. | T-21-S, R-28-E<br>Sec. 31: Lot 4, SW <sup>1/4</sup> , NW <sup>1/4</sup>   | 320      | IC 061396<br>4-1-49   | USA All | S. W. Richardson<br>& Perry R. Bass | Eida Lone Hall                | 3%   | S. W. Richardson<br>& Perry R. Bass |
| 50. | T-21-S, R-29-E<br>Sec. 21: S <sup>1/2</sup>   | 80       | IC 061641<br>3-1-47   | USA All | S. W. Richardson<br>& Perry R. Bass | Magdalene Childers<br>Markham | 1.5% | S. W. Richardson<br>& Perry R. Bass |
| 51. | T-21-S, R-31-E<br>Sec. 8: S <sup>1/2</sup> , NW <sup>1/4</sup>  | 40       | NW 013266<br>12-1-53  | USA All | S. W. Richardson<br>& Perry R. Bass | None                          |      | S. W. Richardson<br>& Perry R. Bass |
| 52. | T-21-S, R-31-E<br>Sec. 8: S <sup>1/2</sup> , NW <sup>1/4</sup>  | 1805.21  | IC 062573<br>1-1-51   | USA All | S. W. Richardson<br>& Perry R. Bass | Helen E. Mapes                | 3%   | S. W. Richardson<br>& Perry R. Bass |
| 53. | T-21-S, R-29-E<br>Sec. 7: Lots 1, 2, 3, 4,<br>SW <sup>1/4</sup> , SW <sup>1/4</sup><br>Sec. 18: Lots 2, 3, 4, SW <sup>1/4</sup> , NW <sup>1/4</sup><br>Sec. 19: Lots 1, 2, SW <sup>1/4</sup> , NW <sup>1/4</sup><br>Sec. 30: Lot 3, 4, SW <sup>1/4</sup> , NW <sup>1/4</sup><br>Sec. 31: Lot 1, NW <sup>1/4</sup> , NW <sup>1/4</sup> |          |                       |         |                                     |                               |      |                                     |

|       |   |         |                       |         |                                     |   |          |                                     |
|-------|---|---------|-----------------------|---------|-------------------------------------|---|----------|-------------------------------------|
| 105.  | T-21-S, R-28-E<br>Sec. 11: <del>W&amp;NW</del><br>Sec. 14: <del>W&amp;N</del>   | 1240    | LC 068669<br>10-1-49  | USA All | S. W. Richardson<br>& Perry R. Bass | Robert E. McKee,<br>General Contractor, Inc.                                  | 5%       | S. W. Richardson<br>& Perry R. Bass |
| 106-A | T-21-S, R-31-E<br>Sec. 6: Lots 1, 2, 3, 4, 5, 6, 7, 8   | 325.72  | LC 068996-A<br>6-1-51 | USA All | S. W. Richardson<br>& Perry R. Bass | Mrs. Ella Belle Robinson<br>son   | 3%       | S. W. Richardson<br>& Perry R. Bass |
| 106-B | T-21-S, R-31-E<br>Sec. 5: Lots 1, 2, 3, 4, 5, 6, 7, 8,<br>10, 11  | 409.40  | LC 068996-A<br>6-1-51 | USA All | S. W. Richardson<br>& Perry R. Bass | Mrs. Ella Belle Robinson<br>Obligation \$500 per acre<br>out of 3% production |          | S. W. Richardson<br>& Perry R. Bass |
| 107.  | T-22-S, R-28-E<br>Sec. 1: All<br>Sec. 8: <del>E&amp;S</del><br>Sec. 9: <del>N&amp;W</del> , <del>S&amp;W</del> , <del>S</del><br>Sec. 10: <del>N</del><br>Sec. 11: <del>N</del>   | 2029.25 | LC 069110-A<br>8-1-51 | USA All | S. W. Richardson<br>& Perry R. Bass | Mrs. Jane Strapp<br>Obligation \$500 per acre<br>out of 3% production         |          | S. W. Richardson<br>& Perry R. Bass |
| 108.  | T-21-S, R-29-E<br>Sec. 3: All   | 940.96  | LC 069111<br>6-1-51   | USA All | S. W. Richardson<br>& Perry R. Bass | Gilbert F. Scheib   | 5%       | S. W. Richardson<br>& Perry R. Bass |
| 109.  | T-22-S, R-28-E<br>Sec. 10: <del>S</del><br>Sec. 11: <del>S</del><br>Secs. 12 & 14: All<br>Sec. 15: <del>E&amp;S</del> , <del>W&amp;N</del><br>Sec. 22: <del>E&amp;N</del><br>Sec. 23: <del>W&amp;N</del>  | 2359.67 | LC 069112-A<br>8-1-51 | USA All | S. W. Richardson<br>& Perry R. Bass | George L. Erwin, Jr.<br>Obligation \$500 per acre<br>out of 3% production     |          | S. W. Richardson<br>& Perry R. Bass |
| 110-A | T-21-S, R-29-E<br>Sec. 27: <del>W&amp;N</del> , <del>W&amp;NW</del> , <del>S&amp;W</del><br>Sec. 28: <del>W&amp;N</del> , <del>S</del><br>Sec. 29: <del>W&amp;N</del> , <del>S</del><br>Sec. 31: Lots 2, 3, 4, 5, 6, 7,<br><del>N</del> , <del>W&amp;S</del> , <del>S&amp;W</del> , <del>N&amp;W</del> , <del>S&amp;W</del> | 1620.86 | LC 069114<br>7-1-49   | USA All | S. W. Richardson<br>& Perry R. Bass | John N. Fidel   | 3%       | S. W. Richardson<br>& Perry R. Bass |
| 110-B | T-21-S, R-29-E<br>Sec. 27: <del>E&amp;N</del> , <del>S&amp;W</del><br>Sec. 29: <del>E&amp;N</del><br>Sec. 28: <del>W&amp;N</del>  | 400     | LC 069114-A<br>7-1-49 | USA All | S. W. Richardson<br>& Perry R. Bass | John N. Fidel<br>Frances Mix  | 2%<br>1% | S. W. Richardson<br>& Perry R. Bass |