

District I  
PO Box 1980, Hobbs, NM 88241-1980  
District II  
811 S. 1st Street, Artesia, NM 88210-2834  
District III  
1000 Rio Brazos Rd., Aztec, NM 87410  
District IV  
2040 South Pacheco, Santa Fe, NM 87505

State of New Mexico  
Energy, Minerals & Natural Resources Department

OIL CONSERVATION DIVISION  
2040 South Pacheco  
Santa Fe, NM 87505

Form C-101  
Revised October 18, 1994  
Instructions on back  
Submit to Appropriate District Office  
State Lease - 6 Copies  
Fee Lease - 5 Copies



☐ AMENDED REPORT

APPLICATION FOR PERMIT TO DRILL, RE-ENTER, DEEPEN, PLUGBACK, OR ADD A ZONE

<sup>1</sup> Operator name and Address Bass Enterprises Production Co. P.O. Box 2760 Midland, TX 79702-2760		<sup>2</sup> OGRID Number 001801
<sup>4</sup> Property Code 1786		<sup>3</sup> API Number 30-015-31065
<sup>5</sup> Property Name James Ranch Unit		<sup>6</sup> Well No. 66

<sup>7</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
M	36	22S	30E		660	South	990	West	Eddy

<sup>8</sup> Proposed 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

<sup>9</sup> Proposed Pool 1 Quahada Ridge (Delaware), SE	<sup>10</sup> Proposed Pool 2
--	-------------------------------

<sup>11</sup> Work Type Code N	<sup>12</sup> Well Type Code 0	<sup>13</sup> Cable/Rotary R	<sup>14</sup> Lease Type Code S	<sup>15</sup> Ground Level Elevation 3292'
<sup>16</sup> Multiple N	<sup>17</sup> Proposed Depth 8000'	<sup>18</sup> Formation Delaware	<sup>19</sup> Contractor WEK Rig 1	<sup>20</sup> Spud Date ASAP

<sup>21</sup> Proposed Casing and Cement Program					
Hole Size	Casing Size	Casing weight/foot	Setting Depth	Sacks of Cement	Estimated TOC
17-1/2"	13-3/8"	48#	520'	400	Surface
11"	8-5/8"	28# & 32#	3780'	885	Surface
7-7/8"	5-1/2"	15-1/2# & 17#	8000'	635	3480' (300 inside intermediate casing)

<sup>22</sup> Describe the proposed program. If this application is to DEEPEN or PLUG BACK give the data on the present productive zone and proposed new productive zone. Describe the blowout prevention program, if any. Use additional sheets if necessary

This well is inside the R-111 Potash Area.  
The surface casing will be set +/- 100' above the salt in the Rustler.  
The intermediate casing will be set into the Lamar Lime.  
Cement will tie 300' into the intermediate casing.  
Attached is our potash notification letter dated March 3, 2000 along with IMC's response letter dated March 13, 2000 indicating "no objections".

Notify OCD at SPUD & TIME  
to witness cementing the  
13 7/8" 8 5/8" casing.

R-111-P

<sup>23</sup> I hereby certify that the information given above is true and complete to the best of my knowledge and belief.

Signature: *William R. Dannels* 3-20-2000

Printed name: William R. Dannels

Title: Division Drilling Supt.

OIL CONSERVATION DIVISION

Approved by: *Jim W. Green* B6A

Title: *District Supervisor*

Approval Date: 4-6-00 Expiration Date: 4-6-01

RECEIVED  
MAR 22 2000  
BLM  
ROSWELL, NM

3-11-00

DISTRICT I  
1625 N. French Dr., Hobbs, NM 58240

DISTRICT II  
811 South First, Artesia, NM 88210

DISTRICT III  
1000 Rio Brancos 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, 1999

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	Pool Code	Pool Name Quahada Ridge (Delaware), SE
Property Code	Property Name JAMES RANCH UNIT	Well Number 66
OGED No. 001801	Operator Name BASS ENTERPRISES PRODUCTION COMPANY	Elevation 3292'

Surface Location

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
M	36	22 S	30 E		660	SOUTH	990	WEST	EDDY

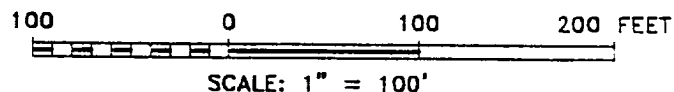
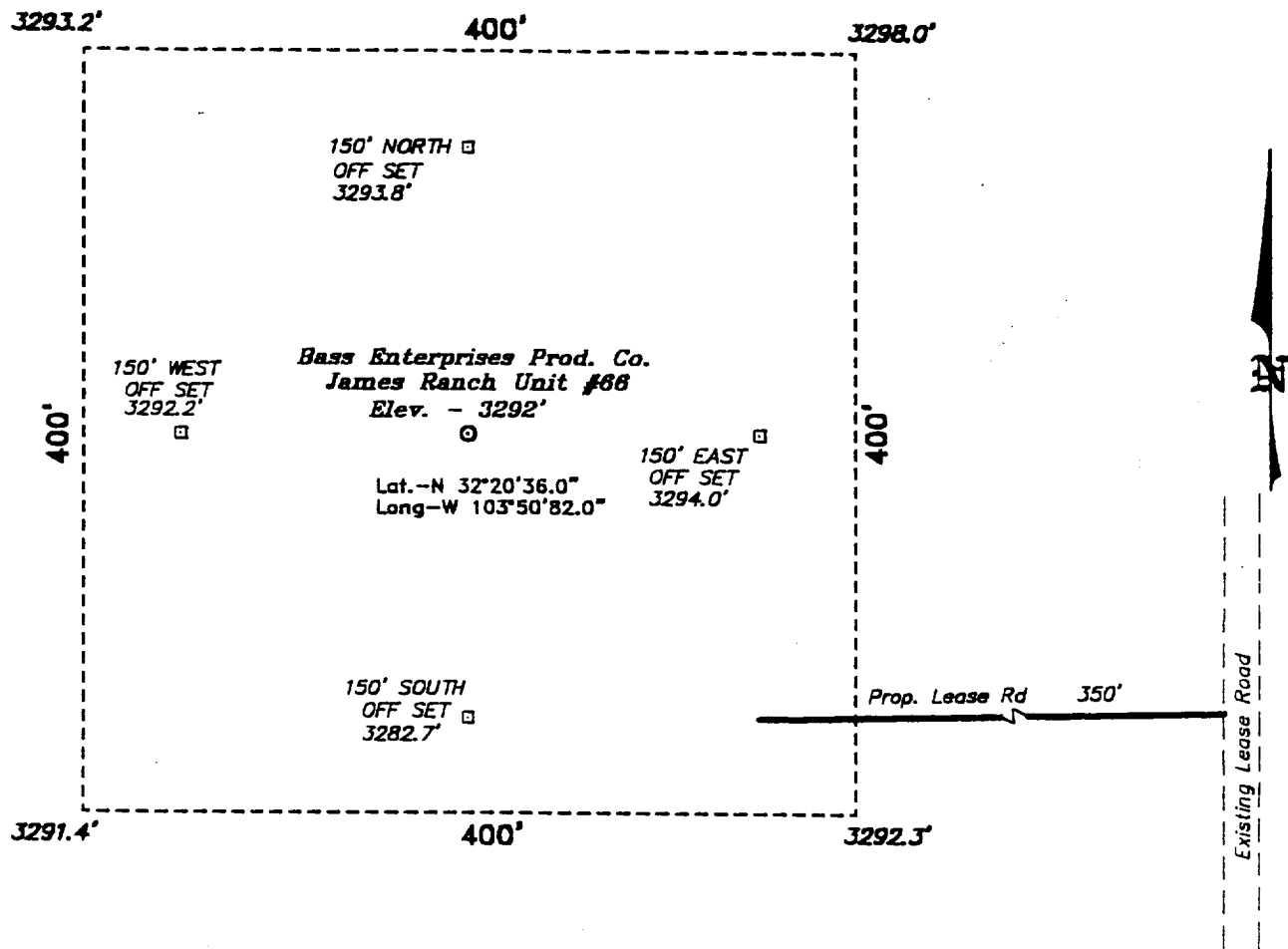
Bottom Hole Location If Different From Surface

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
Dedicated Acres 40	Joint or Infill N	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

	<b>OPERATOR CERTIFICATION</b>  I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief.  <u>William R. Dannels</u> Signature William R. Dannels Printed Name Division Drilling Supt. Title 3-20-2000 Date	
	<b>SURVEYOR CERTIFICATION</b>  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.  February 28, 2000 Date Surveyed <u>Gary L. Jones</u> Signature & Seal Professional Surveyor NEW MEXICO 7977 No. 0114D Certificate No. Gary L. Jones 7977 BASIN SURVEYS	

**SECTION 36, TOWNSHIP 22 SOUTH, RANGE 30 EAST, N.M.P.M.,  
EDDY COUNTY, NEW MEXICO.**



**DIRECTIONS TO LOCATION:**

FROM THE JUNCTION OF CO. RD. 802(WPP ROAD)  
AND STATE HWY 128(JAL HWY), GO WEST ON STATE  
HWY 128 APPROX. 1500 FEET TO A LEASE ROAD;  
THENCE NORTH ON LEASE ROAD APPROX. 3500 FEET  
TO A LEASE ROAD; THENCE WEST ON LEASE ROAD  
APPROX. 2000 FEET; THENCE NORTH ON LEASE ROAD  
APPROX. 0.5 MILE TO A PROPOSED LEASE ROAD  
WHICH LIES 350 FEET FROM THE SOUTHEAST CORNER  
OF THE PROPOSED WELL LOCATION.

**BASIN SURVEYS** P.O. BOX 1786-HOBBS, NEW MEXICO

W.O. Number: 0114 Drawn By: **K. GOAD**

Date: 03-01-2000 Disk: KJG #122 - 0114.DWG

**BASS ENTERPRISES PRODUCTION CO.**

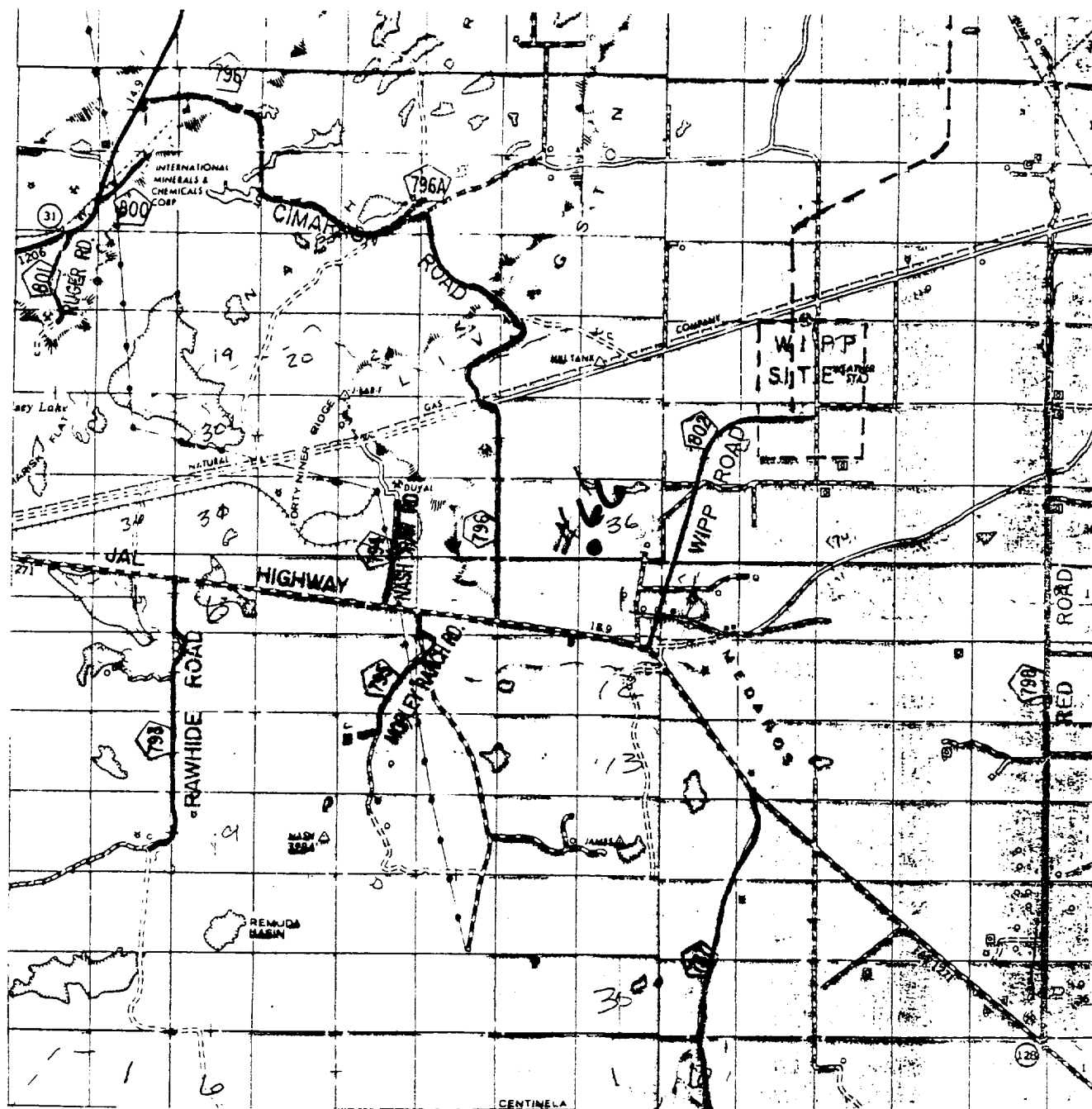
REF: James Ranch Unit No. 66 / Well Pad Topo

THE JAMES RANCH UNIT No. 66 LOCATED 660' FROM  
THE SOUTH LINE AND 990' FROM THE WEST LINE OF  
SECTION 36, TOWNSHIP 22 SOUTH, RANGE 30 EAST,

N.M.P.M., EDDY COUNTY, NEW MEXICO.

Survey Date: 02-28-2000 Sheet 1 of 1 Sheets





# JAMES RANCH UNIT #66

Located at 660' FSL and 990' FWL

Section 36, Township 22 South, Range 30 East,  
N.M.P.M., Eddy County, New Mexico.

**basin**  
**surveys**  
focused on excellence  
in the oilfield

P.O. Box 1786  
1120 N. West County Rd.  
Hobbs, New Mexico 88241  
(505) 393-7316 - Office  
(505) 392-3074 - Fax  
basinsurveys.com

W.O. Number: 0114DD - KJG #122

Survey Date: 02-28-2000

Scale: 1" = 2 MILES

Date: 03-01-2000

**BASS ENTERPRISES**  
**PRODUCTION CO.**

**EIGHT POINT DRILLING PROGRAM  
BASS ENTERPRISES PRODUCTION CO.**

**NAME OF WELL: JAMES RANCH UNIT #66**

**LEGAL DESCRIPTION - SURFACE: 660' FSL & 990' FWL, Section 36, T-22-S, R-30-E, Eddy County, New Mexico.**

**POINT 1: ESTIMATED FORMATION TOPS**

(See No. 2 Below)

**POINT 2: WATER, OIL, GAS AND/OR MINERAL BEARING FORMATIONS**

Anticipated Formation Tops: KB 3307' (est)  
GL 3292'

<u>FORMATION</u>	<u>ESTIMATED TOP FROM KB</u>	<u>ESTIMATED SUBSEA TOP</u>	<u>BEARING</u>
T/Rustler	197'	+3110'	Barren
T/Salt	619'	+2688'	Barren
T/Lamar	3762'	- 455'	Barren
T/Delaware Mtn. Group	3817'	- 510'	Oil/Gas
T/8A Lower Brushy Canyon	7335'	- 4028'	Oil/Gas
T/Bone Spring	7627'	- 4320'	Oil/Gas
TD	8000'	- 4693'	

**POINT 3: CASING PROGRAM**

<u>TYPE</u>	<u>INTERVALS</u>	<u>PURPOSE</u>	<u>CONDITION</u>
13-3/8", 48#, WC-40, STC	0- 520'	Surface	New
8-5/8", 28# & 32#, WC-50, STC	0-3780'	Intermediate	New
5-1/2", 15.50# & 17#, K-55, LTC	0-8000'	Production	New

**POINT 4: PRESSURE CONTROL EQUIPMENT (SEE ATTACHED DIAGRAM)**

A BOP equivalent to Diagram 1 will be nipped up on the surface casing head. When testing, the BOP stack, choke, kill lines, kelly cocks, inside BOP, etc. will be hydro-tested to 70% of the internal yield pressure of the casing. In addition to the rated working pressure test, a low pressure (200 psi) test will be required. These tests will be performed:

- a) Upon installation
- b) After any component changes
- c) Fifteen days after a previous test
- d) As required by well conditions

Con't...

#### POINT 4: PRESSURE CONTROL EQUIPMENT (SEE ATTACHED DIAGRAM)

A function test of pipe and blind rams to insure that the preventers are operating correctly will be performed on each trip. A function test is required only a minimum of once every 24 hours. See the attached diagram #1 for the minimum criteria for the choke manifold.

#### POINT 5: MUD PROGRAM

DEPTH	MUD TYPE	WEIGHT	FV	PV	YP	FL	Ph
0' - 520'	FW Spud	8.4 - 9.0	45-38	NC	NC	NC	9.5
520' - 3780'	Brine	9.8 - 10.0	28-30	NC	NC	NC	9.5
3780' - 6300'	FW	8.4 - 8.6	28-30	NC	NC	NC	9.5
6300' - 7600'	FW/Starch	8.4 - 8.6	28-30	NC	NC	<100	9.5
7600' - TD	FW/Gel/Starch	8.4 - 8.7	32-42	3	1	<100	9.5

#### POINT 6: TECHNICAL STAGES OF OPERATION

##### A) TESTING

None anticipated.

##### B) LOGGING

GR-CNL from base of intermediate casing to surface.

GR-CNL-LDT-AIT from TD to base of intermediate casing.

##### C) CONVENTIONAL CORING

None anticipated.

##### D) CEMENT

##### SURFACE

INTERVAL	AMOUNT SX	FT OF FILL	TYPE	GALS/SX	PPG	FT <sup>3</sup> /SX
0-220'	100	220	Interfill C + 1/4#/sx Flocele + 2% CaCl <sub>2</sub>	14.35	11.9	2.49
220-520' (100% excess circ to surface)	300	300	Class C + 2% CaCl <sub>2</sub>	6.31	14.8	1.34

##### INTERMEDIATE

INTERVAL	AMOUNT SX	FT OF FILL	TYPE	GALS/SX	PPG	FT <sup>3</sup> /SX
Lead						
0-3480'	735	3480	Interfill C + 2% CaCl <sub>2</sub>	14.4	11.9	2.49
Tail						
3480'-3780' (100% excess in open hole)	150	300	Class C Neat	6.31	14.8	1.34



Con't...

## POINT 6: TECHNICAL STAGES OF OPERATION

### D) CEMENT Con't...

PRODUCTION – A two Stage Cementing Procedure with DV tool @ ±5600' will be required.

<u>INTERVAL</u>	<u>AMOUNT SX</u>	<u>FT OF FILL</u>	<u>TYPE</u>	<u>GALS/SX</u>	<u>PPG</u>	<u>FT<sup>3</sup>/SX</u>
2nd Stage						
Lead						
3480'-5200' (50% excess)	170	1720	Interfill C	16.58	11.5	2.77
Tail						
5200'-5600' (50% excess)	75	400	Class C	6.31	14.8	1.32
1st Stage						
5600-8000' (50% excess)	390	2400	Super H + 3#/sx Salt + 4/10% Halad 344 + 3/10% CFR-3	8.67	13.0	1.65

### E) DIRECTIONAL DRILLING

No directional services anticipated.

## POINT 7: ANTICIPATED RESERVOIR CONDITIONS

Normal pressured formations are anticipated throughout this well. No H<sub>2</sub>S is expected.

## POINT 8: OTHER PERTINENT INFORMATION

### A) Auxiliary Equipment

Upper and lower kelly cocks. Full opening stab in valve on the rig floor.

### B) Anticipated Starting Date

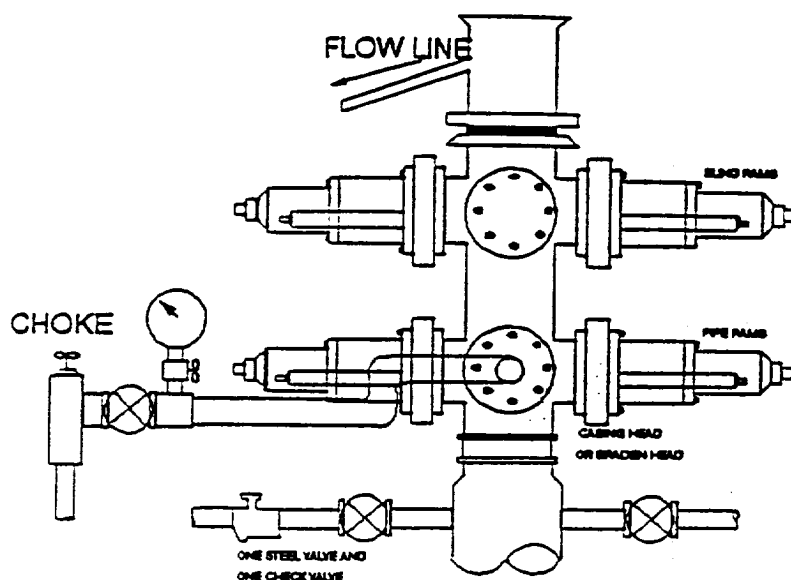
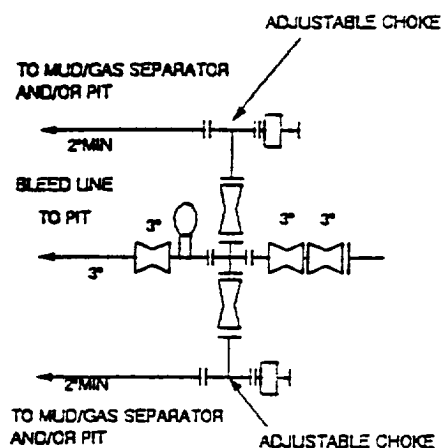
Upon approval

16 days drilling operations

10 days completion operations

BGH/mac  
3/21/00

# 3000 PSI WP



## THE FOLLOWING CONSTITUTE MINIMUM BLOWOUT PREVENTER REQUIREMENTS

- A. One double gate blowout preventer with lower rams for pipe and upper rams blind, all hydraulically controlled.
- B. Opening on preventers between rams to be flanged, studded or clamped and at least two inches in diameter.
- C. All connections from operating manifold to preventers to be all steel hose or tube a minimum of one inch in diameter.
- D. The available closing pressure shall be at least 15% in excess of that required with sufficient volume to operate (close, open, and re-close) the preventers.
- E. All connections to and from preventers to have a pressure rating equivalent to that of the BOP's.
- F. Manual controls to be installed before drilling cement plug.
- G. Valve to control flow through drill pipe to be located on rig floor.
- H. All chokes will be adjustable. Choke spool may be used between rams.

## BASS ENTERPRISES PRODUCTION CO.

201 MAIN ST.  
FORT WORTH, TEXAS 76102-3131  
817/380-8400

March 3, 2000

U.S. MAIL & VIA FACSIMILE (505) 887-0589

IMC Kalium Carlsbad Potash Company  
P. O. Box 71  
Carlsbad, New Mexico 88221-0071

Attn: Mr. John Purcell

Re: Proposed Wells in James Ranch Federal Unit  
Section 36, T22S-R30E (State Lease No. E-5229)  
Section 1, T23S-R30E (Fed. Lease No. NM 02884, LC 0543280)  
Section 6, T23S-R31E (Fed. Lease No. NM 02887, LC 071988)  
James Ranch Unit Well Nos. 33, 34, 35, 62, 66, 68, 74, 75, 81, 82,  
Hudson "1" Federal Well Nos. 2, 3, 4, 5, 6  
Eddy County, New Mexico

Dear Mr. Purcell:

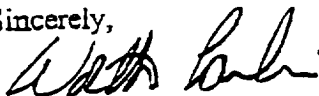
Bass Enterprises Production Co. has plans to drill fifteen (15) wells within the James Ranch Federal Unit area in the Eddy County, New Mexico. Provided below are the well names, locations, and projected depths for these vertical wells.

<u>Well Name</u>	<u>Proposed Depth</u>	<u>Proposed Location</u>
JRU No. 33	7,810' (Delaware)	660' FNL, 1,880' FEL, Section 1, T23S-R30E
JRU No. 34	7,840' (Delaware)	660' FSL, 660' FEL, Section 36, T22S-R30E
JRU No. 35	7,830' (Delaware)	660' FNL, 660' FEL, Section 1, T23S-R30E
JRU No. 62	7,830' (Delaware)	1,200' FSL, 2,080' FEL, Section 1, T23S-R30E
JRU No. 66	7,775' (Delaware)	660' FSL, 990' FWL, Section 36, T22S-R30E
JRU No. 68	11,380' (Wolfcamp)	1,980' FNL, 660' FEL, Section 6, T23S-R31E
JRU No. 74	7,860' (Delaware)	330' FNL, 660' FWL, Section 6, T23S-R31E
JRU No. 75	7,920' (Delaware)	1,980' FSL, 1,650' FWL, Section 6, T23S-R31E
JRU No. 81	7,780' (Delaware)	560' FNL, 990' FWL, Section 1, T23S-R30E

<u>Well Name</u>	<u>Proposed Depth</u>	<u>Proposed Location</u>
IRU No. 82	7,840' (Delaware)	1,200' FSL, 760' FEL, Section 1, T23S-R30E
Hudson "1" Fed. #2	7,805' (Delaware)	2,310' FSL, 1,980' FWL, Section 1, T23S-R30E
Hudson "1" Fed #3	7,780' (Delaware)	1,980' FNL, 850' FWL, Section 1, T23S-R30E
Hudson "1" Fed # 4	7,785' (Delaware)	1,980' FSL, 660' FWL, Section 1, T23S-R30E
Hudson "1" Fed #5	7,780' (Delaware)	990' FSL, 660' FWL, Section 1, T23S-R30E.
Hudson "1" Fed. # 6	7,800' (Delaware)	1,200' FSL, 1,650' FWL, Section 1, T23S-R30E

Bass hereby request a waiver of any objection IMC Kalium may have for the drilling of the above described wells. In the event IMC Kalium is agreeable to providing such waiver, please sign in the space provided and return one (1) executed original to the undersigned at your earliest convenience. Thank you very much and should you have any questions or comments or require additional information, please don't hesitate to contact the undersigned at (817) 390-8568.

Sincerely,



Worth Carlin

WWC:ca

AGREED and ACCEPTED this \_\_\_\_\_ day of \_\_\_\_\_, 2000.

IMC KALIUM CARLSBAD POTASH COMPANY

By: \_\_\_\_\_

Title: \_\_\_\_\_



IMC Kalium Carlsbad Potash Company  
P. O. Box 71  
1361 Potash Mines Road  
Carlsbad, New Mexico 88221-0071  
505.887.2871  
505.887.0589 Fax

March 13, 2000

Mr. Worth Carlin  
Bass Enterprises Production Co.  
201 Main St.  
Fort Worth, Texas 76102-3131

**RECEIVED**

**MAR 15 2000**

**LAND DEPARTMENT**

RE: Proposed Wells in James Ranch Federal Unit  
Section 36, T23S-R30E (State Lease No. E-5229)  
Section 1, T23S-R30E (Fed Lease No. NM 02884, LC 0543280)  
Section 6, T23S-R31E (Fed. Lease No. NM 02887, LC 071988)  
JRU Nos. 33, 34, 35, 62, 66, 68, 74, 75, 81, and 82.  
Hudson "1" Federal Well Nos. 2, 3, 4, 5, and 6.  
Eddy County, New Mexico

Dear Mr. Carlin:

IMC Kalium Carlsbad Potash Company has received your notice that Bass Enterprises Production Company intends to the above referenced wells. IMC Kalium has no objections to Bass drilling wells JRU Well No. 33, JRU Well No. 34, JRU Well No. 35, JRU Well No. 62, JRU Well No. 66, JRU Well No. 74, JRU Well No. 75, JRU Well No. 81, JRU Well No. 82, Hudson "1" Fed. #2, Hudson "1" Fed. #3, and Hudson "1" Fed. #4 to depths no deeper than the base of the Delaware formation at the stated locations. Based on the best available information, the locations of the fore mentioned wells will not interfere with the development of our potash resources.

IMC Kalium does object to the proposed locations for JRU Well No. 68, Hudson "1" Fed. #5, and Hudson "1" Fed. #6. The locations given for Hudson "1" Fed. #5 and Hudson "1" Fed. #6, with a projected final depths in the Delaware formation, are within 1/4 mile of where we expect to mine in the future. If Hudson "1" Fed. #5 well could be moved at least 80 feet to the North and Hudson "1" Fed. #6 well could be moved at least 45 feet to the North; the impact on potash recovery would be greatly diminished. The location given for JRU Well No. 68, with a projected final depth in the Wolfcamp formation is within 1/4 mile of where we expect to mine. Drilled at the proposed location; this well would interfere with the development of potash reserves.

The above considerations are based on the best available information at this time; as more information becomes available our estimates of the extent of the potash resources in the area may change. Therefore, please consider the "objections offered" and "no objection offered" to the well locations to be valid for one year only. If you are still considering a well location that a potash operator has or has not objected to, more than one year prior, notify us again at that time so we can make the decision based on current information.

IMC Kalium submits this letter in lieu of the forms requested.

Sincerely,

A handwritten signature in dark ink, appearing to read "John Purcell".  
John Purcell  
Chief Mine Engineer

c: Don Purvis Charlie High Leslie Theiss Lori Wroteneery  
Dan Morehouse Tim O'Brien Craig Cranston