

PLAINS PETROLEUM OPERATING COMPANY

March 28, 1995

Bureau of Land Management P. O. Box 1778 Carlsbad, New Mexico 88221-1778

Re: Application to Drill
E. C. Hill 'B' Federal #13
947' FSL & 1361' FEL (SHL)
1120' FSL & 1380' FEL (BHL)
Sec 34 (O), T23S, R37E
Lea County, New Mexico
Lease No.: 064118

Dear Sirs:

Please find enclosed, in triplicate, an original and two copies of the above referenced Application to Drill. Should you have any questions, please call me at (915)683-4434.

#### Sincerely, PLAINS PETROLEUM OPERATING COMPANY

Dominic J. Bazile Area Engineer

14 - 22 14 - 22

| Form 3160-3<br>(November 1983)                                | IIN   | TED STATES                                     | 2                     | (Oth                             | IT IN TR<br>er instruc<br>reverse si |                           | Budget Bureau                                     | No. 1004-0136                         |
|---|---|--|-----------------------|----------------------------------|--------------------------------------|---------------------------|---|---------------------------------------|
| (formerly 9-331C)   |   | IT OF THE I                                    |                       |                                  | TEVELOC BI                           | 100                       | Expires August                                    | -                                     |
|   | BUREAU O  | F LAND MANAC                                   | GEMEN                 | т                                |                                      |                           | 5. LEASE DEBIGNATION                              | AND BERIAL NO.                        |
|   | N FOR PERMIT  |  |                       |                                  |                                      | ACK                       | LC 064118<br>6. IF INDIAN, ALLOTTE                | OR TRIBE NAME                         |
| Ia. TYPE OF WORK  |   | TO DRIEL, I                                    |                       | IN, OK FI                        |                                      |                           |   |                                       |
| DI D                      | RILL 🖾  | DEEPEN   |                       | PLL                              | IG BAC                               | к 🗆 🛛                     | 7. UNIT AGREEMENT 1                               | AMB                                   |
| 011. 1773   | WELL OTHER  |  | 8IN<br>Zon            |                                  | MULTIPI<br>Zone                      | • 🗆                       | S. FARM OR LEASE NA                               | ¥8                                    |
| 2. NAME OF OPERATOR   |   |  |                       |                                  |                                      |                           | E. C. Hill 'B                                     | ' Federal                             |
|   | leum Operating (  | Company  |                       |                                  | <u> </u>                             |                           | 9. WELL NO.                                       |                                       |
| 3. ADDRESS OF OPERATOR  | -   |  | 70701                 |                                  |                                      |                           | 13  |                                       |
| 415 W. Wall,<br>4. LOCATION OF WELL (                         | Suite 1000, Mic<br>Report location clearly as                 | nd in accordance wit                           | /9/01<br>th any St    | ate requiremen                   | its.*)                               |                           | 10. FIELD AND POOL, O<br>Teague McKee             | DE WILDCAT                            |
| At surince  |   |  |                       |                                  | <b>-</b> ,                           |                           | 11. SEC., T., B., M., OR                          |                                       |
| 94/ FSL & I:<br>At proposed prod. so                          | 361' FEL (SHL)  |  | Un                    | it O                             |                                      |                           | AND SURVEY OR A                                   | EEA .                                 |
| 1120' FSL & 1   | 380' FEL (BHL)  |  |                       |                                  |                                      |                           | Sec 34, T23S,                                     |                                       |
|   | AND DIRECTION FROM NI   | AREST TOWN OR POS                              | T OFFICE              |                                  |                                      |                           | 12. COUNTY OR PARISH                              | 13. STATE                             |
| 10.3 miles NI   |   |  | 18 10                 | OF ACRES IN                      |                                      | 17 10 0                   | Lea   | NM                                    |
| LOCATION TO NEARE<br>PROPERTY OR LEASE<br>(Also to nearest di | ST<br>LINE, FT.<br>·lg. unit line, if any)                    | 947'   | 10. 40.               | 520'                             | LEASE                                |                           | F ACRES ASSIGNED<br>(IS WELL                      |                                       |
|   | DRILLING, COMPLETED,  | 619'   | 19. pro               | POSED DEPTH<br>9850'             |                                      | _                         | T OR CABLE TOOLS                                  |                                       |
| OR AFFLIED FOR, ON T  | his LEASE, FT.  |  |                       | 9650                             |                                      | KO                        | 22. APPROX. DATE WO                               |                                       |
| 3255'   |   |  |                       |                                  |                                      |                           | As Soon As  |                                       |
| 23.   | <u> </u>  | PROPOSED CASI                                  | NG AND                | CEMENTING                        | PROGRAM                              | <br>[                     |   |                                       |
| SIZE OF ROLE  | SIZE OF CASING  | WEIGHT PER F                                   | 0 <b>0T</b>           | SETTING DI                       | LPTH                                 | I                         | QUANTITY OF CEME                                  |                                       |
| 17-1/2"   | 13-3/8"   | 48#, H-40                                      | STC                   | 350'                             |                                      | 375 s                     | x circ  |                                       |
| 12-3/4"   | 8-5/8"  | 24,32# J-                                      |                       |                                  |                                      |                           | x circ  |                                       |
| 7-7/8"  | 5-1/2"  | 15.5,17#                                       |                       | 9850 <b>'</b>                    |                                      | 925 s:                    | x circ  |                                       |
|   | 1   | & N-80 L                                       |                       |                                  | -                                    |                           |   |                                       |
| we propose to   | o drill this we   | II thru the l                                  | мскее                 | and comp                         | lete a                               | s a Mcl                   | kee producer.                                     |                                       |
| Mud Program:  |   | 0' -   | 350'                  | SD                               | ud mud                               | , FW, ş                   | zel   |                                       |
|   | 3.  | 50' – 1  | 3000'                 | -                                |                                      |                           | mud, mud wt 1                                     | 0 - 10.2 ppg                          |
|   |   |  |                       |                                  |                                      | - 6                       |   |                                       |
| 1   | 30  | - '00  | 9850'                 | FW                               | gel 8                                | 8<br>.6 - 9               | D ppg, VIs 28                                     | -35                                   |
|   | se a 3000 psi S<br>pon receipt of                             |  |                       | itauiite-0                       | perace                               | u dog,                    | auring the dra                                    |                                       |
|   | y 25 days will  |  |                       |                                  |                                      |                           |   |                                       |
|   | for the comple  |  |                       |                                  |                                      |                           |   |                                       |
|   | e around April  |  |                       |                                  |                                      |                           |   |                                       |
| Drilling Con  | tingency Plan t   | o be adhered                                   | to wł                 | nile dril                        | ling t                               | his we                    | 11.   | · · · · · · · · · · · · · · · · · · · |
|   |   |  |                       |                                  |                                      |                           | ***v.   |                                       |
| zone. If proposal is to<br>preventer program, if a            | BE PROPOSED PROGRAM : In<br>b drill or deepen directio<br>ny. | f proposal is to deep<br>nally, give pertinent | oen or plu<br>data on | ug back, give o<br>subsurface lo | iata on pr<br>cations an             | esent produ<br>d measured | active sone and propose<br>and true vertical dept | ed new productive<br>hs. Give blowout |
| 81GNED Don  | 1436  | TIT  |                       | rea Engin                        | eer                                  |                           | JATE3-2   | 28-95                                 |
| (This space for Fed   | lefal or State office use)                                    |  |                       | ·····                            |                                      |                           |   | <u> </u>                              |
| PERMIT NO.  |   |  |                       | APPROVAL DATE                    |                                      |                           |   | <u> </u>                              |
|   |   |  |                       |                                  |                                      |                           |   |                                       |
| APPROVED BY<br>Conditions of Appro                            | WAL, IF ANY :   | TIT  | "LE                   |                                  |                                      |                           | DATE  |                                       |

#### \*See Instructions On Reverse Side

Title 18 U.S.C. Section 1001, makes it a crime for any person knowingly and willfully to make to any department or agency of the

#### PLAINS PETROLEUM OPERATING COMPANY

E. C. HILL FEDERAL 'B' #13 947' FSL & 1361' FEL (SHL) 1120' FSL & 1380' FEL (BHL) Sec 34(O), T23S, R37E Lea County, New Mexico Lease No. 064118 March 28, 1995

In addition with Form 3160-2, Application to Drill the above well, Plains Petroleum Operating Company submits the following in accordance with BLM requirements.

#### 1. ESTIMATED GEOLOGICAL MARKERS

| GL: 3255' | KB: 3267' |           |
|-----------|-----------|-----------|
| FORMATION | TOP       | <u>SS</u> |
| Penrose   | 3404'     | -137'     |
| Glorietta | 4917"     | -1650'    |
| Paddock   | 5029'     | -1762'    |
| Blinebry  | 5272'     | -2005'    |
| Tubb      | 5942'     | -2675'    |
| Drinkard  | 6372'     | -3105'    |
| Abo       | 6462'     | -3195'    |
| Devonian  | 7342'     | -4075'    |
| Silurian  | 7994'     | -4727'    |
| Fusselman | 8408'     | -5141'    |
| Montoya   | 8768'     | -5501'    |
| Simpson   | 9062'     | -5795'    |
| McKee     | 9417'     | -6150'    |
| TD        | 9850'     | -6583'    |

Plains Petroleum Operating Company E. C. Hill 'B' Federal #13 Lea County, New Mexico Lease No. 064118 March 28, 1995 Page 2

#### 2. CASING DETAIL

|              | CASING<br>SIZE OD | INTERVAL      | LENGTH<br>OF<br>INTERVAL | WEIGHT<br>#/FT | INTERVAL<br>WEIGHT | CASING<br>GRADE | JOINT |
|--------------|-------------------|---------------|--------------------------|----------------|--------------------|-----------------|-------|
| Surface      | 13-3/8"           | 0° - 350°     | 350'                     | 18#            | 16,800             | H-10            | STC   |
| Intermediate | 8-5/8*            | 0' - 100'     | 100'                     | 32#            | 3.200              | J-55            | STC   |
|              | 8-5/8"            | 100' - 2200'  | 2100'                    | 21#            | 50,400             | J-55            | STC   |
|              | 8-5/8"            | 2200' - 3000' | 800'                     | 32#            | 25,600             | J-55            | STC   |
| Production   | 5-1/2"            | 0'- 1000'     | 1000'                    | 17#            | 17,000             | J-55            | LTC   |
|              | 5-1/2"            | 1000' - 7500' | 6500'                    | 15.5#          | 100,750            | J-55            | LTC   |
|              | 5-1/2"            | 7500' - 9400' | 1900'                    | 17#            | 32,300             | J-55            | LTC   |
|              | 5-1/2"            | 9400' - 9850' | 3001                     | 17#            | 5,100              | N-80            | LTC   |
| Tubing       | 2-7/8*            | 0 - 9700      | 9700'                    | 6.5 <b>#</b>   | 63,050             | J-55            | EUE   |

### 3. CEMENTING & FLOAT EQUIPMENT DETAIL

| WELL DATA             | SURFACE             | INTERMEDIATE<br>(TD 3000') | PRODUCTION<br>(TD 9850')                   |
|-----------------------|---------------------|----------------------------|--|
| Depth                 | 350'                | 3000'                      | 9850'                                      |
| Casing Size           | 13-3/8"             | 8-5/8"                     | 5-1/2"                                     |
| Hole Size             | 17-1/2"             | 12-1/4"                    | 7-7/8"                                     |
| Desired Fill          | Surface             | Surface                    | Surface                                    |
| Hole Volume           | 245 Ft <sup>3</sup> | 940 Ft <sup>3</sup>        | 1150 Ft <sup>3</sup> , 475 Ft <sup>3</sup> |
| Recommended<br>Volume | 490 Ft <sup>3</sup> | 1410 Ft <sup>3</sup>       | 1325 Ft <sup>3</sup> , 475 Ft <sup>3</sup> |
| DV Tool Depth         | N/A                 | N/A                        | 3000'                                      |

#### PLAINS PETROLEUM OPER. CO.

| Ope  | erator:             | PPOC                        |                         |                        | Well                       | Name: E              | E C HILL                | . B FED                       | #13  |
|--|---------------------|-----------------------------|-------------------------|------------------------|----------------------------|----------------------|-------------------------|-------------------------------|------|
| Pro  | ject I              | D:                          |                         |                        | Locat                      | ion: 94              | 47' FSL                 | 1361'                         | FEL  |
| Design Parameters:Design Factors:Mud Weight (10.20 ppg) : 0.530 psi/ftCollapse : 1.125Shut in casing pressure : 1920 psiBurst : 1.10Internal gradient (burst) : 0.010 psi/ft8 Round : 1.75 (J)Annular gradient (burst) : 0.530 psi/ftButtress : 1.60 (J)Tensile load is determined using buoyed weight0ther : 1.50 (J)Service rating is "Sweet"Body Yield : 1.50 (B) |                     |                             |                         |                        |                            |                      |                         |                               |      |
| 4  | ength<br>feet)      | Size<br>(in.)               | Weight<br>(lb/ft)       | Grad                   | e Joir                     |                      | Depth<br>feet)          | Drift<br>(in.)                | Cost |
| 1<br>2<br>3  | 100<br>2,100<br>800 | 8.625<br>8.625<br>8.625     | 32.00<br>24.00<br>32.00 | К-5<br>К-5<br>К-5      | 5 ST&(                     |                      | 100<br>2,200<br>3,000   | 7.875<br>7.972<br>7.875       |      |
|  | Load<br>(psi)       | Collapse<br>Strgth<br>(psi) | S.F.                    | Burst<br>Load<br>(psi) | Min Int<br>Strgth<br>(psi) |                      | Load<br>(kips)          | Tensior<br>Strgth<br>) (kips) | S.F. |
| 1<br>2<br>3  | 53<br>1166<br>1590  | 2427<br>1348<br>2530        | 9.999<br>1.156<br>1.592 | 1920<br>1868<br>776    | 3930<br>2950<br>3930       | 2.05<br>1.58<br>5.06 | 66.85<br>64.15<br>21.61 | 5 263                         | ł    |

Prepared by : DJB, Midland, Texas

Date : 03-29-1995

Remarks

Minimum segment length for the 3,000 foot well is 100 feet.

SICP is based on the ideal gas law, a gas gravity of 0.15, and a mean gas temperature of 123°F (Surface 74°F, BHT 104°F & temp. gradient 1.000°/100 ft.) Surface/Intermediate string:

Next string will set at 9,850 ft. with 8.80 ppg mud (pore pressure of 4,503 psi.) The frac gradient of 0.650 at the casing seat results in an injection pressure of 1,950 psi. Effective BHP (for burst) is 1,950 psi, the BHP load is 360 psi (using an annular mud of 10.00 ppg) and the differential gradient is -0.520 psi/ft.

NOTE: The design factors used in this casing string design are as shown above. As a general guideline, Lone Star Steel recommends using minimum design factors of 1.125 - Collapse (with evacuated casing), 1.0 - Burst, 1.8 - 8 Round Tension, 1.6 - Buttress Tension, and 1.5 - Body Yield. Collapse strength under axial tension was calculated based on the Westcott, Dunlop and Kemler curve. Engineering responsibility for use of this design will be that of the purchaser. Costs for this design are based on a 1987 pricing model. (Version 1.06)

#### co. PLAINS PETROLEUM OPER.

| Ope  | erator:                        | PPOC                             |                                  |                              | Well                         | Name:                        | E C HIL                          | L B FED                          | #13                                   |
|--|--------------------------------|----------------------------------|----------------------------------|------------------------------|------------------------------|------------------------------|----------------------------------|----------------------------------|---------------------------------------|
| Pro  | oject I                        | D:                               |                                  |                              | Loca                         | tion: 9                      | 47' FSL                          | 1361'                            | FEL                                   |
| Design Parameters:Design Factors:Mud Weight (8.80 ppg): 0.457 psi/ftCollapse : 1.125Shut in casing pressure : 4294 psiBurst : 1.10Internal gradient (burst): 0.021 psi/ft8 Round : 1.75 (J)Annular gradient (burst) : 0.457 psi/ftButtress : 1.60 (J)Tensile load is determined using buoyed weight0 ther : 1.50 (J)Service rating is "Sweet"Body Yield : 1.50 (B) |                                |                                  |                                  |                              |                              |                              |                                  |                                  |                                       |
| L<br>(   | ength<br>feet)                 | Size<br>(in.)                    | Weight<br>(lb/ft                 | Grad<br>)                    | e Joi                        |                              | Depth<br>feet)                   | Depth<br>(TVD)                   | Cost                                  |
| 1<br>2<br>3<br>4   | 1,000<br>6,200<br>2,200<br>458 | 5.500<br>5.500<br>5.500<br>5.500 | 17.00<br>15.50<br>17.00<br>17.00 | K-5<br>K-5<br>K-5<br>N-8     | 5 LT&<br>5 LT&               |                              | 1,000<br>7,200<br>9,400<br>9,858 | 1,000<br>7,200<br>9,394<br>9,850 |                                       |
|  | Load<br>(psi)                  | Collapse<br>Strgth<br>(psi)      | S.F.                             | Burst<br>Load<br>(psi)       | Min Int<br>Strgth<br>(psi)   | Yield<br>S.F.                | Load<br>(kips                    |                                  | S.F.                                  |
| 1<br>2<br>3<br>4   | 457<br>3291<br>4294<br>4503    | 3855<br>3827<br>4877<br>6280     | 8.433<br>1.163<br>1.136<br>1.395 | 4315<br>4315<br>2527<br>1570 | 5320<br>4810<br>5320<br>7740 | 1.23<br>1.11<br>2.11<br>4.93 | 136.9<br>122.2<br>39.1<br>6.7    | 8 239<br>1 272                   | 1.99 J<br>1.95 J<br>6.96 J<br>51.65 J |
|  | aarad b                        |                                  | Midle                            | nd Tex                       |                              |                              |                                  |                                  |                                       |

DJB, Midland, Texas 03-29-1995 Prepared by : Date :

Remarks

marks :
Minimum segment length for the 9,858 foot well is 100 feet.
SICP is based on the ideal gas law, a gas gravity of 0.15, and a mean gas temperature of 123°F (Surface 74°F, BHT 172°F & temp. gradient 1.000°/100 ft.)
For burst purposes, lost circulation occurs behind the pipe at 3,000 ft, • above which point, the annular mud weight of 8.800 ppg goes to zero. The equivalent pore gradient at the seat is 6.12 ppg.
Minimum drift diameter of this directional well string is 4.767 in. Other parameters include: TD (Meas): 9,858 ft. Departure @ TD: 173 ft. KOP: 7,750 ft. BU a: 1.500°/100 ft. @ 1st Slant a: 5.138° VD: 8,092 ft Departure: 15 ft MD: 8,092 ft Bending load: 8.84 kips

NOTE: The design factors used in this casing string design are as shown above. As a general guide-line, Lone Star Steel recommends using minimum design factors of 1.125 - Collapse (with evacuated casing), 1.0 - Burst, 1.8 - 8 Round Tension, 1.6 - Buttress Tension, and 1.5 - Body Yield. Collapse strength under axial tension was calculated based on the Westcott, Dunlop and Kemler curve. Engineering responsibility for use of this design will be that of the purchaser. Costs for this design are based on a 1987 pricing model. (Version 1.06)

Plains Petroleum Operating Company E. C. Hill 'B' Federal #13 Lea County, New Mexico Lease No. 064118 March 28, 1995 Page 3

#### <u>SLURRY</u>

|                | Surface  | Intermediate   | Production<br>1st Stage   | Production<br>2nd Stage   |
|----------------|--|--|---|---|
| Recommendation | 375 sx 'C' +<br>2% Cacl <sub>2</sub> +<br>1/4#/sk<br>Celloseal | Lead: 450 sx<br>'C' + .25%<br>Dispersent +<br>2.5% Extender<br>+ .5% Gel +<br>.2% Salt + 1/4<br>PPS<br>Cellophane<br>Tail: 100 sx Cl<br>'C' Neat | Lead: 100 sx<br>36:65 Poz 'C' +<br>6% Gel + 9<br>PPS Salt + .2%<br>Defoamer +<br>.8% F.L.<br>Additive<br>Tail: 575 sx<br>50:50 Pox 'C' +<br>2% Gel + 4<br>PPS Salt + .2%<br>Defoamer +<br>.6% F. L. | Lead: 150 sx 'C'<br>+ .25%<br>Dispersent +<br>2.5% Extender<br>+ .5% Gel +<br>.2% Salt + 1/4<br>PPS Cellophane<br>Tail: 100 sx Cl<br>'C' Neat |
| Yield          | 1.32 Ft <sup>3</sup> /sk                                       | 2.85 Ft <sup>3</sup> /sk,<br>1.32 Ft <sup>3</sup> /sk,   | 2.14 Ft <sup>3</sup> /sx,<br>1.32 Ft <sup>3</sup> /sx   | 2.85 Ft <sup>3</sup> /sx,<br>1.32 Ft <sup>3</sup> /sx   |
| Weight         | 14.8 PPG   | 11.6 PPG<br>14.8 PPG   | 12.7 PPG<br>14.2 PPG  | 11.6 PPG<br>14.8 PPG  |
| Mix Water      | 6.32 gal/sk  | 17.2 gal/sk<br>6.32 gal/sk   | 11.6 gal/sk<br>6.32 gal/sk  | 17.2 gal/sk<br>6.32 gal/sk  |

Plains Petroleum Operating Company E. C. Hill 'B' Federal #13 Lea County, New Mexico Lease No. 064118 March 28, 1995 Page 4

#### 4. MUD DETAIL

| <u>DEPTH</u>  | PROPERTIES   | TREATMENT   |
|---------------|--|---|
| 0 - 350'      | Weight: 8.7 - 9.4<br>Viscosity: 33 35<br>Solids: <4.                 | Spud Mud: Fresh water gel with sufficient to viscosity to clean hole. |
| 350' - 3000'  | Weight: 10.0 - 10.2<br>Viscosity: 26 - 28<br>Solids: < 1.0           | Drill out from surface csg with brine water                           |
| 3000' - 9850' | Weight: 8.6 - 9.2<br>Viscosity: 28 - 35<br>Solids < 1.0<br>WL 7 - 10 | Drill out from intermediate casing with fresh water mud               |

#### 5. PRESSURE CONTROL EQUIPMENT (BOPE) DETAIL

13-5/8" API Shaffer 3000# series 600 dual hydraulic preventers adapted for the drilling contractors 4-1/2" drill pipe. The BOPS will be tested after they are installed on the surface casing, prior to drilling out, and each time they are removed or rearranged on the wellhead. See Exhibit A.

#### 6. TESTING AND LOGGING PROGRAMS

#### TESTING

Drill stem tests may be performed to quantify and identify prospective producing horizons as drilling progresses. Production testing will be commenced after the well is drilled and casing has been set and cemented.

#### LOGGING

At TD, the following open hole well logs will be run: GR-CNL-CDL-DLL-MLL

#### SURFACE USE AND OPERATION PLAN PLAINS PETROLEUM OPERATING COMPANY E. C. HILL FEDERAL 'B' #13 947' FSL & 1361' FEL (SHL) 1120' FSL & 1380' FEL (BHL) Sec 34P, T23S, R37E Lea County, New Mexico Lease No. 064118 March 28, 1995

#### I. <u>Existing Roads</u>:

- A. Exhibit B is a plat showing the proposed wellsite as staked, approximately 10.3 miles NE of Jal, New Mexico.
- B. Exhibit C is a map showing existing roads in the area.
- C. All existing roads will be maintained and repaired as necessary.

#### II. Access Roads:

- A. The access roads to the E. C. Hill 'B' Federal #12 will be used and extended to the proposed wellsite as shown on Exhibit C.
- B. Roads will be 12 ft wide and constructed of caliche.
- C. Roads are center line flagged.
- D. No turn arounds, culverts, cuts, gates or cattleguards will be required.
- III. Existing Wells: See Exhibit C
- IV. Location of Tank Batteries:

Existing tank batteries will be used.

- V. Location & Type of Water Supply:
  - A. A fresh water supply well is located on the lease. This fresh water will be used for drilling. Water will be transferred from the pump station to the pits using a temporary polyline.

#### SURFACE USE AND OPERATION PLAN

Plains Petroleum Operating Company E. C. Hill Federal 'B' #13 Lea County, New Mexico Lease No. 064118 March 28, 1995 Page 2

#### VI. Source of Construction Materials:

- A. Construction materials will be caliche, which will be obtained by the dirt contractor from caliche pits on the North border of the lease.
- B. Topsoil from the location will be stockpiled near the location for future rehabilitation use.

#### VII. Method for Handling Waste Disposal:

- A. Cuttings All cuttings will be held in the reserve pit.
- B. Drilling Fluids All drilling fluids will be allowed to evaporate in the reserve pit.
- C. Produced Fluids (oil & water) Any produced fluids will be collected in tanks until hauled to an approved disposal system.
- D. Garbage and Other Waste Material All waste materials will be removed from the lease to a disposal facility.
- VII. Ancillary Facilities: Not Applicable
- IX. <u>Well site Layout</u>: Exhibit A
- X. <u>Plans for Restoration of Surface</u>:
  - A. After completion of the well, pits will be filled and the location cleaned of all trash and junk to leave the wellsite in good condition.
  - **B.** Any unguarded pits containing fluids will be fenced off and covered with netting until they are filled.
  - C. The reserve pit will be backfilled and leveled and the surface returned to its original contour.

#### SURFACE USE AND OPERATION PLAN

Plains Petroleum Operating Company E. C. Hill Federal 'B' #13 Lea County, New Mexico Lease No. 064118 March 28, 1995 Page 3

#### XI. Other Information

- A. Topography: Terrain in the general area consists of an undulating plane covered by sandy soils of aeolian material of Holocene age.
- B. Soil: The solid belongs to the typic haplargids paleargids association.
- C. Vegetation: Consists of Quercus havardii, Prosopis juliflora, yucca glauca, Suaeda sp., Euphorbia sp., Aristida sp., Bouteloua eriopoda, Cenchrus incertus, Muhlenbergia arenacea and Sporobolus spp.
- D. Fauna: Consists of Crotalus and sistrurus, canis latrans, lepus alleni and mephitis.
- E. The surface of this land is being utilized to a limited extent as grazing land for cattle.
- F. The surface is privately owned.
- G. No cultural resources or archaeological sites present.

#### XII. Company Representative:

Dominic J. Bazile Plains Petroleum Operating Company 415 W. Wall, Suite 1000 Midland, TX 79701 Phone (915) 683-4434

#### SURFACE USE AND OPERATION PLAN

Plains Petroleum Operating Company E. C. Hill Federal 'B' #13 Lea County, New Mexico Lease No. 064118 March 28, 1995 Page 4

#### XIII. Certification

I hereby certify that I have inspected the proposed drillsite and access route; that I am familiar with the conditions which presently exist; that the statements made in the plan are, to the best of my knowledge true and correct: and, that the work associated with the operations proposed herein will be performed by Plains Petroleum Operating Company and its contractors and subcontractors in conformity with this plan and the terms and conditions under which is approved. This statement is subject to the provisions of 18 USC 1001 for the filing of a false statement.

Danie My 2 T Area Engineer

Area Engigeer/ Plains Petroleum Operating Company

The Class III choke manifold is suitable for Class III workovers and drilling operations. The Standard Class III choke manifold is shown in Figure 11J.8 below. Specific design features of the Class III manifold include:

1. The manifold is attached to a drilling spool or the top ram preventer side outlet.

2. The minimun internal diameter is 2" (nominal) for outlets, flanges, valves and lines.

3. Includes two steel gate valves in the choke line at the drilling spool outlet. The inside choke line valve may be remotely controlled (HCR).

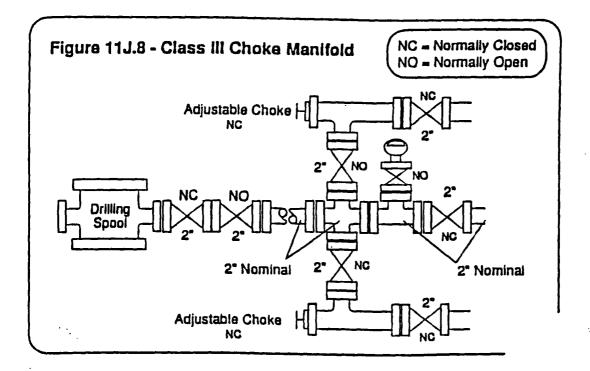
4. Includes two manually adjustable chokes which are installed on both side of the manifold cross. Steel isolation gate valves are installed between both chokes and the cross, and also downstream of both chokes.

5. Includes a blooey line which runs straight through the cross and is isolated by a steel gate valve.

6. Includes a valve isolated pressure gauge suitable for drilling service which can display the casing pressure within view of the choke operator.

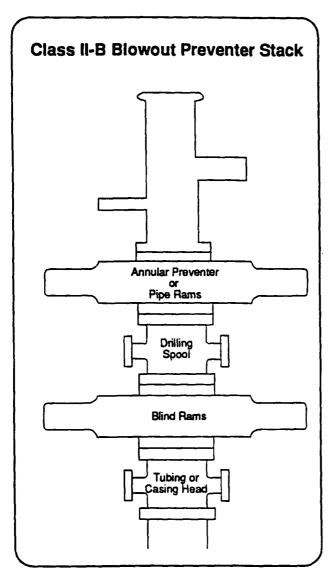
7. Returns through the choke manifold must be divertible through a mud-gas seperator and then be routed to either the shale shaker or the reserve pit through a buffer tank or manifold arrangement.

8. If the choke manifold is remote from the wellhead, a third master valve should be installed immediately upstream of the manifold cross.



#### EXHIBIT A.1

#### **CLASS II-B BLOWOUT PREVENTER STACK:**



The Class II-B preventer stack is designed for drilling or workover operations. It is composed of a single hydraulically operated annular preventer on top, then a drilling spool, and a single blind ram preventer on bottom. In an alternate configuration, a single pipe ram preventer may be substituted for the annular preventer. The choke and kill lines are installed onto the drilling spool and must have a minimum internal diameter of 2". An emergency kill line may be installed on the wellhead. As the maximum anticipated surface pressure of this stack is less than 3000 psi, screwed connections may be used. All components must be of steel construction. The Class II-B blowout preventer stack is shown to the left

## SENT PREVIOUSLY AND ON FILE WITH YOUR OFFICE

CONTINGENCY PLAN FOR DRILLING OPERATIONS

#### PLAINS PETROLEUM OPERATING COMPANY

BAYLUS CADE LEASE EVA E. BLINEBRY LEASE E. C. HILL 'B' FEDERAL LEASE G. H. MATTIX LEASE

#### E. C. HILL 'B' FEDERAL #13

LEA COUNTY, NEW MEXICO

March 28, 1995

# **EMERGENCY NOTIFICATION**

#### PLAINS PETROLEUM OPERATING COMPANY 415 West Wall Street Midland, Texas 79701 915/683-4434

Dominic J. Bazile

Residence

915/683-0012

Rodney Long

Residence

915/524-3822

DISTRICT I P. O. Box 1980 Hobbs, NM 88241-1980

DISTRICT II P. O. Drawer DD Artesia, NM 88211-0719

DISTRICT III 1000 Rio Brazos Rd. Aztec, NM 87410 State of New Mexico Energy, Minerals, and Natural Resources Department Form C-102 Revised 02-10-94

Instructions on back

Submit to the Appropriate District Office State Lease — 4 copies Fee Lease — 3 copies

#### OIL CONSERVATION DIVISION P. 0. Box 2088 Santa Fe, New Mexico 87504-2088

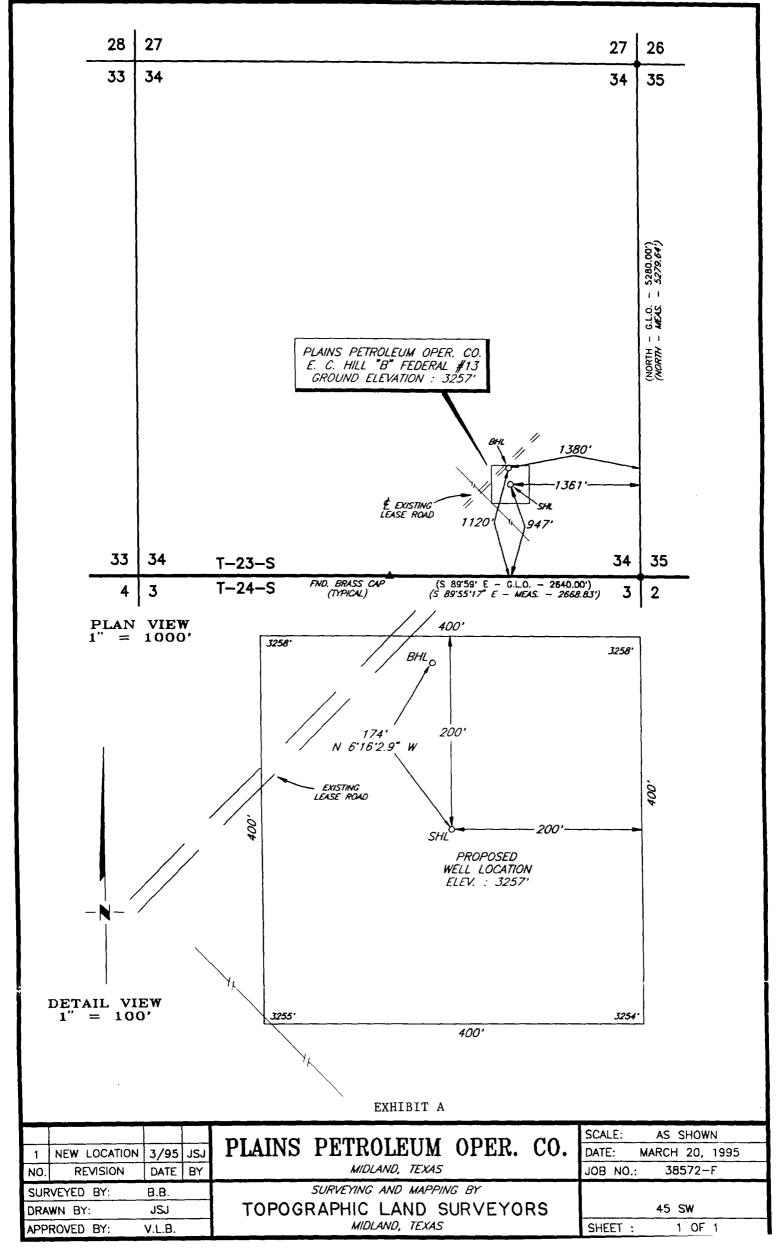
AMENDED REPORT

<u>DISTRICT\_IV</u> P. O. Box 2088 Santa Fe, NM 87507-2088

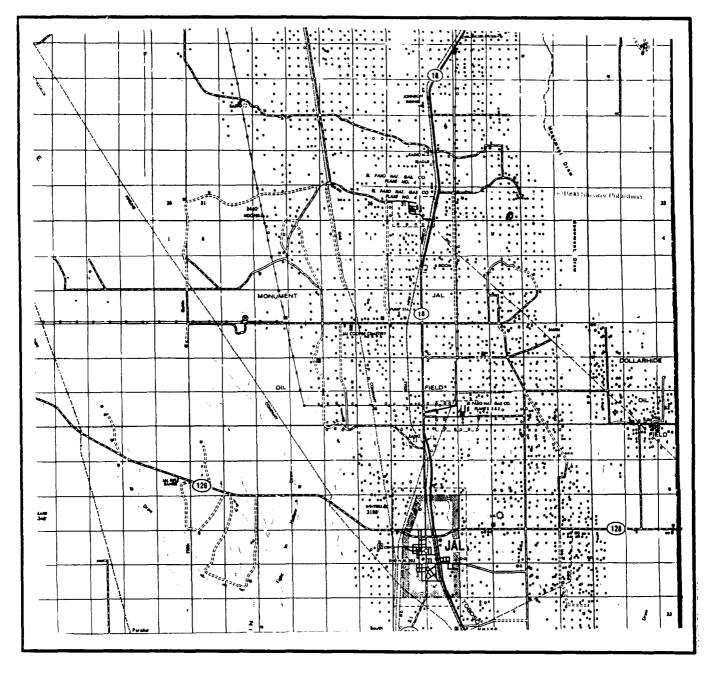
<sup>2088</sup> WELL LOCATION AND ACREAGE DEDICATION PLAT

| 1 API Number   |            | 1              | 2 Po | ol Code     |          | 3 Poo    | Nam          | e             |             |            | <u> </u>             |                                       |                     |
|----------------|------------|----------------|------|-------------|----------|----------|--------------|---------------|-------------|------------|----------------------|---------------------------------------|---------------------|
|                |            |                |      | 58900       |          | T        | eagu         | e, Sim        | npson       |            |                      |                                       |                     |
|                |            |                |      |             |          |          |              | • Well Number |             |            |                      |                                       |                     |
|                |            |                |      |             | E. C.    | HILL     | "B"          | FEDE          | RAL         |            |                      | 13                                    | :                   |
| 'OGRID No.     |            |                |      |             |          |          |              | • Blevation   |             |            |                      |                                       |                     |
| 017805         |            | 1 -            |      | PLAIN       | S PETR   |          | 1 DF         | PERATI        | ING COMP    | AN         | Y                    | 3257                                  | •                   |
| 017005         |            | _L             |      |             |          |          |              |               |             |            |                      |                                       |                     |
|                |            |                |      |             | " SUF    | RFACE    | LOC          | ATION         |             |            |                      |                                       |                     |
| UL or lot no.  | Section    | Township       |      | Range       |          | Lot Ida  | Feet         | from the      | North/South | line       | Feet from the        | East/West line                        | County              |
| 0              | 34         | 23 SOUTH       | 37   | EAST, 1     | I.M.P.M. |          | ş            | 947'          | SOUTH       |            | 1361'                | EAST                                  | LEA                 |
|                | l          |                | L    | *****       |          |          |              |               |             |            |                      | L                                     |                     |
|                |            | "BOLL          | ЭМ   | HOLE        | LOCATI   | ION IF   | DI           | FERE          | NT FROM     | SU         | JRFACE               |                                       |                     |
| UL or lot no.  | Section    | Township       |      | Range       | ;        | Lot Ida  | Feet         | from the      | North/South | line       | Feet from the        | Bast/West line                        | County              |
| 0              | 34         | 23 SOUTH       | 37   | EAST, 1     | M.P.M.   |          | 1            | 120'          | SOUTH       |            | 1380'                | EAST                                  | LEA                 |
| 12 Dedicated A | cres 13 Jo | oint or Infill | 14 C | onsolidatio | n Code   | 15 Order | No.          |               | .l          |            |                      | /=                                    |                     |
|                |            |                |      |             |          |          |              |               |             |            |                      |                                       |                     |
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| " <b>-</b>     | <u> </u>   |                |      |             |          |          |              |               |             | 71         | OPERATO              | R CERTIFIC                            | ATTON               |
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|                |            | i i            |      |             |          |          |              | [             |             |            | March 29             | 1995                                  |                     |
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|                |            |                |      |             | 1        |          |              | 1             |             |            | Signature an         | He Woy                                | <u> </u>            |
|                |            | ·+             |      |             | ÷        |          |              | +             |             |            | ProfessionaN         | SULTEYOTTEY                           | •                   |
|                |            | i.             |      |             | i        | BHL      |              | ÷;            | 1380'       |            | 1 State              | 10                                    | Ø                   |
|                |            |                |      |             |          | 0        | /c           | 1             | 1361'       |            |                      | LYNN 🗼 *                              | Ŕ                   |
|                |            |                |      |             |          | 0        | /            | SHL           |             |            | <b>  </b> , <b> </b> | EZNER                                 | . B                 |
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|                |            | i              |      |             | į        | , / 20   | $\mathbf{T}$ | 947           | ,           | l          | 1 Ster               | m &                                   | ne                  |
|                |            |                |      |             | i        |          |              | i/            |             |            | Certifice A          | Quanto Sur 6                          |                     |
|                |            | l<br>          |      |             |          |          | /            | 1             |             |            | V. L. WER            | WEBAINU BAP.S                         | . #7920             |
|                |            |                |      |             |          |          |              | n             |             |            | המד# ם∩ו ו           | TAL CW                                |                     |

# WELL LOCATION AND LEASE ROAD IN SECTION 34, T-23-S, R-37-E, N.M.P.M. LEA COUNTY, NEW MEXICO



# VICINITY MAP



| SECTION     | <u>34</u> TV | VP <u>23-</u> | <u>S</u> RGE    | <u> </u>                   |
|-------------|--------------|---------------|-----------------|----------------------------|
| SURVEY      | NEW MEXIC    |               | AL MERIDIA      | AN                         |
| COUNTY      | LEA          | AT FOI        | STATE           | NM<br>FFL (SHL)            |
| DESCRIPTION | 11           | 20' FSL &     | <u>1380'</u> FE | NM<br>FEL (SHL)<br>L (BHL) |

OPERATOR PLAINS PETROLEUM OPERATING CO.

DISTANCE & DIRECTION \_FROM THE JCT. OF S.H. 128 & S.H. 18 IN JAL, GO NORTH 11.0 MILES ON S.H. 18, THENCE EASTERLY 2.4 MILES ON LEASE ROAD, THENCE SOUTHEAST 0.8 MILES ON LEASE ROAD, THENCE SOUTH-WEST 0.5 MILE ON LEASE ROAD TO A POINT ± 25' NORTH OF THE LOCATION.



This location has been very carefully staked on the ground according to the best official survey records, maps, and other data available to us. Review this plat and notify us immediately of any

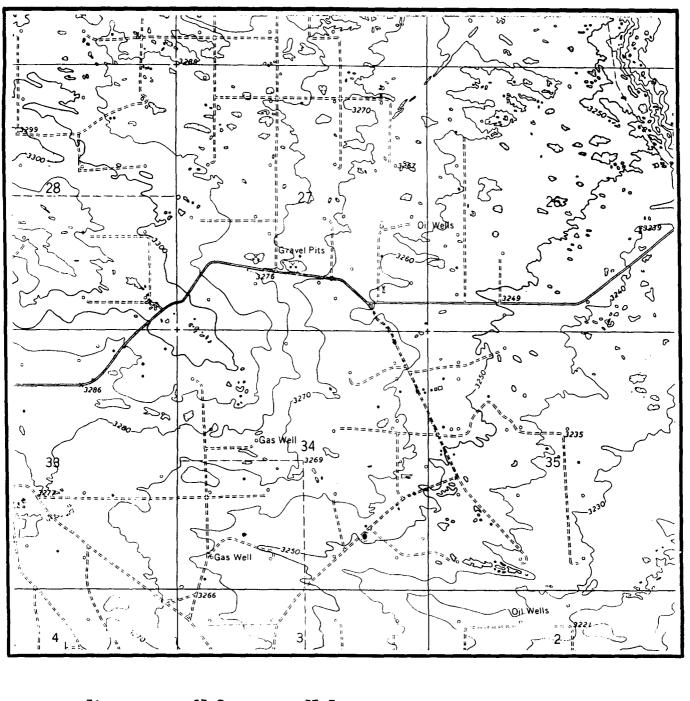
Review this plat and notify us immediately of any possible discrepancy.

#### EXHIBIT B

# TOPOGRAPHIC LAND SURVEYORS

Surveying & Mapping for the Oil & Gas Industry

1307 N. HOBART PAMPA, TX. 79065 (800) 658–6382 6709 N. CLASSEN BLVD. OKLAHOMA CITY, OK. 73116 (800) 654-3219 2903 N. BIG SPRING MIDLAND, TX. 79705 (800) 767-1653 VICINITY MAP



| SECTION     | <u>.34</u> TWP     | <u>23–S</u>                  | RGE                            | <u>37–E</u>   |
|-------------|--------------------|------------------------------|--------------------------------|---------------|
| SURVEY      | NEW MEXICO         | PRINCIPAL                    | MERIDIAN                       |               |
| COUNTY      | LEA                | ST/                          | ATENM                          | [             |
| DESCRIPTION | LEA<br>947<br>112( | 'FSL&1<br><u>) FSL&amp;1</u> | .361'FEL<br><u>380' FEL(</u> I | (SHL)<br>3HL) |
|             |                    |                              |                                |               |

OPERATOR PLAINS PETROLEUM OPERATING CO.

DISTANCE & DIRECTION \_FROM THE JCT. OF S.H. 128 & S.H. 18 IN JAL, GO NORTH 11.0 MILES ON S.H. 18, THENCE EASTERLY 2.4 MILES ON LEASE ROAD, THENCE SOUTHEAST 0.8 MILES ON LEASE ROAD, THENCE SOUTH-WEST 0.5 MILE ON LEASE ROAD TO A POINT ±25' NORTH OF THE LOCATION.



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# EXHIBIT C TOPOGRAPHIC LAND SURVEYORS

Surveying & Mapping for the Oil & Gas Industry

1307 N. HOBART PAMPA, TX. 79065 (800) 658-6382 6709 N. CLASSEN BLVD. OKLAHOMA CITY, OK. 73116 (800) 654-3219

2903 N. BIG SPRING MIDLAND, TX. 79705 (800) 767-1653