# MESA GRANDE RESOURCES, INC.

1200 PHILTOWER BUILDING TULSA, OKLAHOMA 74103 (918) 587-8494

RECEIVED

FEB 1 8 1986

February 12, 1986

BUREAU OF LAND MANAGEMENT FARMINGTON RESOURCE AREA

Mr. Jim Levato
Bureau of Land Management
Farmington Resource Area
Caller Service 4104
Farmington, New Mexico 87499

Re: Federal Bearcat #1
SE½ Sec. 22-T25N-R2W
Rio Arriba County, New Mexico

FEB 2 0 1986

OIL CON. DIV

Dear Mr. Levato,

Enclosed is a copy of the Cement Bond Log and the Proposed Completion Procedure for the above referenced well.

APPROVED AS AMENDED

FEB 181986

Sincerely,

M. MILLENBACH AREA MANAGER

Christopher L. Phillips Manager of Field Operations

CLP/1ri

Since possible communication between zones may occur & subsequent reservoir damage, you are required to perform this proposed operation by April 18, 1986

#### FEDERAL BEARCAT #1

## PROPOSED COMPLETION PROCEDURE

# NOTES: 1) All measurements are KD, 15' above GL.

- 2) Lower DV tool is at 6,214' and open. Closing seat is 3.680". Estimate weight to close ports at 10,000#.
- 3) Top DV toolis at 3,589' and closed. Pre-drill-out ID is 4.125".
- 4) Production Perfs will be from top down, with 4" DML, 120 degrees. Phased, 2 shots per point. Charge and diameter to be determined later.

## I. REMEDIAL CEMENT WORK

- A. Run CBL from lower DV tool to top of cement and determine free pipe. NOTE: CBL was run 1/9/86, top of cement 5,800', free pipe at 5,700'.
- B. MIRU DDPU. PU & RIH w/sub and 2 3/8" tubing to 6,200 and circulate hole. Clean with 2% KCL water. Stack out 10,000# string weight on DV tool at 6,214' and close ports. Pressure test to 2,500#. If no leak off POH.
- C. RU GO and perforate 4 squeeze holes with 3 1/8" hollow steel carrier at 5,700.
- D. RU Dowell Schlumburger and break circulation and cement through perfs. Raise cement to 2,200'. Cement per design with 65/35 poz and 8% gel.

### II. COMPLETION

- A. PU bit, scraper, drill collars and tubing. Drill and clean out hole to 7,850'. Circulate hole, clean with 2% KCL water with NE. Pressure test casing to 2,500# SP for 1/4 hour. If no leak off POH. If leak off occurs, POH & PU positive cementer packer and RBIH and squeeze perfs. Repeat drill out and pressure test.
- B. Run CBL from PBTD to surface. RIH 2 7/8" tubing and spot 500 gals. 15% acid at 7,370. PU to 6,250 and swab fluid level down to SN. POH.
- C. RU GO and perforate Sanostee zone. (Top down.) 7,265', 68', 70', 74', 78', 91', 94', 7,303', 09', 15', 18', 21', 26', 7,333', 43', 47', 51', 54', 61', 64', 73' for total points 21. Total shots 42.

- D. PU Packer and tubing and RIH to 7,200'. Set Packer and breakdown and acidize perfs with 10,000 gals. 15%, 80 quality foamed 15% HCL per DS design.
- E. Flow and swab test Sanostee.
- F. POH with tubing and Packer. RU GO and set Baker Model "C" wireline. Set bridge plug at 7,225' +.
- G. RIH with tubing and spot 500 gals. 15% acid at 7,190' across Gallup zone. PU to 5,700' and swab fluid level to SN.
- H. RU GO and perforate Gallup zone. (Top down.)
  6,717', 21', 24', 27', 31', 36', 41', 44', 6,747', 50', 53',
  58', 66', 77', 81', 84', 87', 95', 6,801', 10', 6,891', 95', 6,900',
  02', 10', 14', 17', 25', 31', 34', 37', 45', 6,951', 53', 63',
  66'.

  Total points 43. Total holes 86.
  RU Dowell Schlumberger and acidize and frac per design. Swab and flow well back.
- I. Retrieve bridge plug at 7,225 with N2 for clear out.
- J. RIH with 2 7/8 tubing completion assembly with SN at 7,400'  $\pm$  and tubing anchor at 6,500'  $\pm$ . Release to production. Run interference test.

# MESA GRANDE RESOURCES, INC.

1200 PHILTOWER BUILDING TULSA, OKLAHOMA 74103 (918) 587-8494

RECEIVED

February 12, 1986

FEB 1 8 1986

BUREAU OF LAND MANAGEMENT FARMINGTON RESOURCE AREA

Mr. Jim Lavato
Bureau of Land Management
Farmington Resource Area
Caller Service 4104
Farmington, New Mexico 87499

Re: Federal Bearcat #1
SE¼ Sec. 22-T25N-R2W
Rio Arriba County, New Mexico

DEGEIVED FEB 2 0 1986

OIL CON. DIV.

Dear Mr. Lovato,

Enclosed is a copy of the Cement Bond Log and the Proposed Completion Procedure for the above referenced well.

APPROVED AS AMENDED

Sincerely,

Find feller Find. MILLENBACH AREA MANAGER

Christopher L. Rhillips Manager of Field Operations

CLP/1ri

Since possible communication between zones way occur + subsequent reservoir damage, you are required to perform the proposed operation by April 18, 1986.

NMCO

A/

## FEDERAL BEARCAT #1

### PROPOSED COMPLETION PROCEDURE

#### NOTES:

- 1) All measurements are KD, 15' above GL.
- 2) Lower DV tool is at 6,214' and open. Closing seat is 3.680". Estimate weight to close ports at 10,000#.
- 3) Top DV toolis at 3,589' and closed. Pre-drill-out ID is 4.125".
- Production Perfs will be from top down, with 4" DML, 120 degrees.

  Phased, 2 shots per point. Charge and diameter to be determined later.

### I. REMEDIAL CEMENT WORK

- A. Run CBL from lower DV tool to top of cement and determine free pipe. NOTE: CBL was run 1/9/86, top of cement 5,800', free pipe at 5,700'.
- B. MIRU DDPU. PU & RIH w/sub and 2 3/8" tubing to 6,200 and circulate hole. Clean with 2% KCL water. Stack out 10,000# string weight on DV tool at 6,214' and close ports. Pressure test to 2,500#. If no leak off POH.
- C. RU GO and perforate 4 squeeze holes with 3 1/8" hollow steel carrier at 5,700.
- D. RU Dowell Schlumburger and break circulation and cement through perfs. Raise cement to 2,200'. Cement per design with 65/35 poz and 8% gel.

### II. COMPLETION

- A. PU bit, scraper, drill collars and tubing. Drill and clean out hole to 7,850'. Circulate hole, clean with 2% KCL water with NE. Pressure test casing to 2,500# SP for 1/4 hour. If no leak off POH. If leak off occurs, POH & PU positive cementer packer and RBIH and squeeze perfs. Repeat drill out and pressure test.
- B. Run CBL from PBTD to surface. RIH 2 7/8" tubing and spot 500 gals. 15% acid at 7,370. PU to 6,250 and swab fluid level down to SN. POH.
- C. RU GO and perforate Sanostee zone. (Top down.) 7,265', 68', 70', 74', 78', 91', 94', 7,303', 09', 15', 18', 21', 26', 7,333', 43', 47', 51', 54', 61', 64', 73' for total points 21. Total shots 42.

- D. PU Packer and tubing and RIH to 7,200'. Set Packer and breakdown and acidize perfs with 10,000 gals. 15%, 80 quality foamed 15% HCL per DS design.
- E. Flow and swab test Sanostee.
- F. POH with tubing and Packer. RU GO and set Baker Model "C" wireline. Set bridge plug at 7,225' +.
- G. RIH with tubing and spot 500 gals. 15% acid at 7,190' across Gallup zone. PU to 5,700' and swab fluid level to SN.
- H. RU GO and perforate <u>Gallup</u> zone. (Top down.)
  6,717', 21', 24', 27', 31', 36', 41', 44', 6,747', 50', 53',
  58', 66', 77', 81', 84', 87', 95', 6,801', 10', 6,891', 95', 6,900',
  02', 10', 14', 17', 25', 31', 34', 37', 45', 6,951', 53', 63',
  66'.

  RU Dowell Schlumberger and acidize and frac per design. Swab and flow well back.
- I. Retrieve bridge plug at 7,225 with N2 for clear out.
- J. RIH with 2 7/8 tubing completion assembly with SN at 7,400' + and tubing anchor at 6,500' +. Release to production. Run interference test.