

PROPOSED WELL PLAN

| WELL NAME <u>LOCKHART B NO. 9</u> |            | FIELD <u>NMFU</u> |                     |
|-----------------------------------|------------|-------------------|---------------------|
| <u>ATTACHMENT</u>                 | <u>NO.</u> | <u>REQUIRED</u>   | <u>NOT REQUIRED</u> |
| CASING CENTRALIZERS, SCRATCHERS   | _____      | <u>X</u>          | _____               |
| CEMENTING                         | _____      | <u>X</u>          | _____               |
| MUD PROGRAM                       | _____      | <u>X</u>          | _____               |
| WELL PLAN OUTLINE                 | _____      | <u>X</u>          | _____               |
| PORE PRESSURE - FRAC GRADIENT     | _____      | _____             | _____               |
| PROJECTED PROGRESS                | _____      | _____             | _____               |
| CROSS SECTION OR WELL COURSE      | _____      | _____             | _____               |
| HYDRAULICS PROGRAM                | _____      | _____             | _____               |
| BIT PROGRAM                       | _____      | _____             | _____               |
| VENDER USAGE LIST                 | _____      | _____             | _____               |

DRILLING AND COMPLETION PROCEDURE

1. 0'- 1375'- Drill a 12-1/4" hole. Run and cement casing. (See casing and cement programs) WOC 18 hours, pressure test casing to 600 psi and drill out.
2. 1375'-3830' - Drill a 7-7/8" hole. Drill out shoe and pressure test formation to 200 psi. Run and cement casing. (See cement and casing programs).
3. Detailed completion procedure to be prepared after open hole logs are analyzed.

NOTE: Casing pressure tests should be 30 minutes in duration.

LIST TYPE OF STRING BY CODE LETTERS, i.e. CONDUCTOR (C); SURFACE (S); INTERMEDIATE (I); PRODUCTION (P); LINDER (L); PERFORATIONS (PP)

TYPE OF STRINGS &  
INTERVAL (FT)

| FROM-TO | OD | DRIFT<br>ID | WT<br>PER<br>FT | GRADE | THREAD | AMT | WT. IN AIR, WT. IN MUD |          | REMARKS |
|---------|----|-------------|-----------------|-------|--------|-----|------------------------|----------|---------|
|         |    |             |                 |       |        |     | 1000 LBS               | 1000 LBS |         |

|                |        |        |       |      |     |       |      |  |                       |
|----------------|--------|--------|-------|------|-----|-------|------|--|-----------------------|
| (S) 0' - 1375' | 8-5/8" | 7.972" | 24#   | K-55 | STC | 1375' | 33   |  |                       |
| (P) 0' - 3830' | 5-1/2" | 4.825" | 15.5# | K-55 | STC | 3830' | 59.4 |  | Sandblast bottom 400' |

| TYPE OF STRING | CENTRALIZERS |          | SCRATCHER   |          | OTHER ACCESSORY EQUIPMENT                                             |  | REMARKS |
|----------------|--------------|----------|-------------|----------|-----------------------------------------------------------------------|--|---------|
|                | NO. FROM-TO  | INTERVAL | NO. FROM-TO | INTERVAL | (SUCH AS DEGASSERS, MUD, CENTRIFUGE<br>FLOAT COLLARS, ETC. - SPECIFY) |  |         |

|            |                    |  |                    |  |                             |  |                                                                           |
|------------|--------------------|--|--------------------|--|-----------------------------|--|---------------------------------------------------------------------------|
| Surface    | (14) 0' - 1375'    |  | NONE               |  | Guide shoe, float collar    |  | 100' spacing for centralizers                                             |
| Production | (2) 1275' - 1375'  |  | (22) 3500' - 3830' |  | Float shoe and float collar |  | 2 centralizers just above 8-5/8<br>shoe and remainder one every<br>joint. |
|            | (29) 2700' - 3830' |  |                    |  |                             |  | 15' spacing for scratchers                                                |

| <u>DEPTH INTERVAL<br/>FROM-TO</u> | <u>WEIGHT<br/>LBS/CAL</u> | <u>TYPE</u> | <u>OIL %</u> | <u>pH</u> | <u>WATER LOSS<br/>(cc)</u> | <u>VIS. (sec.)</u> | <u>YIELD<br/>POINT</u> | <u>THINNING<br/>AGENTS</u> | <u>WATER LOSS<br/>AGENTS</u> |
|-----------------------------------|---------------------------|-------------|--------------|-----------|----------------------------|--------------------|------------------------|----------------------------|------------------------------|
| 0'-1375'                          | 8.5-9.0                   | Spud        | -            | 9.0+      | -                          | -                  | -                      | -                          | As necessary                 |
| 1375'-3830'                       | 9.0-10.0                  | Salt gel    | -            | 9.0-10.0  | 10-12+                     | 35-40              | -                      | -                          | " " "                        |

REMARKS

1. Below 1375' drill with saturated brine to keep hole enlargement to a minimum.
2. Add gelling agents as required to carry cuttings.
3. Keep pressure surges to a minimum below 1375'.
4. Condition mud to reduce water loss 50' above Seven Rivers.
5. Condition mud to reduce viscosity prior to pumping cement.