

**NEW MEXICO OIL CONSERVATION COMMISSION**  
**INITIAL WELL DELIVERABILITY TEST REPORT FOR 19 72**

Form C122-A  
 Revised 1-1-66

|                           |                              |                            |                           |
|---------------------------|------------------------------|----------------------------|---------------------------|
| POOL NAME<br><b>Basin</b> | POOL SLOPE<br>n = <b>.75</b> | FORMATION<br><b>Dakota</b> | COUNTY<br><b>San Juan</b> |
|---------------------------|------------------------------|----------------------------|---------------------------|

|                                                           |                                      |                                               |                                                   |                                                   |                                          |
|-----------------------------------------------------------|--------------------------------------|-----------------------------------------------|---------------------------------------------------|---------------------------------------------------|------------------------------------------|
| COMPANY<br><b>Odessa Natural</b>                          |                                      |                                               | WELL NAME AND NUMBER<br><b>Burroughs State #1</b> |                                                   |                                          |
| UNIT LETTER<br><b>D</b>                                   | SECTION<br><b>36</b>                 | TOWNSHIP<br><b>26</b>                         | RANGE<br><b>11</b>                                | PURCHASING PIPELINE<br><b>E1 Paso Natural Gas</b> |                                          |
| CASING O.D. - INCHES<br><b>4.500</b>                      | CASING I.D. - INCHES<br><b>4.052</b> | SET AT DEPTH - FEET<br><b>6348</b>            | TUBING O.D. - INCHES<br><b>2.375</b>              | TUBING I.D. - INCHES<br><b>1.995</b>              | TOP - TUBING PERF. - FEET<br><b>6232</b> |
| GAS PAY ZONE<br>FROM <b>6168</b> TO <b>6241</b>           |                                      | WELL PRODUCING THRU<br>CASING TUBING <b>X</b> |                                                   | GAS GRAVITY<br><b>.728</b>                        | GRAVITY X LENGTH<br><b>4537</b>          |
| DATE OF FLOW TEST<br>FROM <b>8-8-72</b> TO <b>8-16-72</b> |                                      |                                               | DATE SHUT-IN PRESSURE MEASURED<br><b>11-27-71</b> |                                                   |                                          |

**PRESSURE DATA - ALL PRESSURES IN PSIA**

|                                      |                                                          |                                                  |                                                  |                                                         |                                                              |                                                              |
|--------------------------------------|----------------------------------------------------------|--------------------------------------------------|--------------------------------------------------|---------------------------------------------------------|--------------------------------------------------------------|--------------------------------------------------------------|
| (a) Flowing Casing Pressure (DWt)    | (b) Flowing Tubing Pressure (DWt)                        | (c) Flowing Meter Pressure (DWt)                 | (d) Flow Chart Static Reading                    | (e) Meter Error (Item c - Item d)                       | (f) Friction Loss (a - c) or (b - c)                         | (g) Average Meter Pressure (Integr.)<br><b>247</b>           |
| (h) Corrected Meter Pressure (g + e) | (i) Avg. Wellhead Press. $P_t = (h + f)$<br><b>247</b> ✓ | (j) Shut-in Casing Pressure (DWt)<br><b>1700</b> | (k) Shut-in Tubing Pressure (DWt)<br><b>1687</b> | (l) $P_c$ = higher value of (j) or (k)<br><b>1700</b> ✓ | (m) Del. Pressure $P_d = \frac{50}{100} P_c$<br><b>850</b> ✓ | (n) Separator or Dehydrator Pr. (DWt) for critical flow only |

**FLOW RATE CORRECTION (METER ERROR)**

|                                         |                                                   |                                              |                                            |
|-----------------------------------------|---------------------------------------------------|----------------------------------------------|--------------------------------------------|
| Integrated Volume - MCF/D<br><b>480</b> | Quotient of $\frac{\text{Item c}}{\text{Item d}}$ | $\sqrt{\frac{\text{Item c}}{\text{Item d}}}$ | Corrected Volume<br>Q = <b>480</b> ✓ MCF/D |
|-----------------------------------------|---------------------------------------------------|----------------------------------------------|--------------------------------------------|

**WORKING PRESSURE CALCULATION**

|                |                      |                                         |         |                       |                                    |
|----------------|----------------------|-----------------------------------------|---------|-----------------------|------------------------------------|
| $(1 - e^{-S})$ | $(F_c Q_m)^2 (1000)$ | $R^2 = (1 - e^{-S}) (F_c Q_m)^2 (1000)$ | $P_t^2$ | $P_w^2 = P_t^2 + R^2$ | $P_w = \sqrt{P_w^2}$<br><b>247</b> |
|----------------|----------------------|-----------------------------------------|---------|-----------------------|------------------------------------|

**DELIVERABILITY CALCULATION**

|                                                                |                                                                                    |                     |
|----------------------------------------------------------------|------------------------------------------------------------------------------------|---------------------|
| $D = Q \left[ \frac{P_c^2 - P_d^2}{P_c^2 - P_w^2} \right]^n =$ | $\frac{480}{\left[ \frac{2,167,500}{2,828,991} \right]^n} = \frac{.7662}{.8190} =$ | $393 \text{ MCF/D}$ |
|----------------------------------------------------------------|------------------------------------------------------------------------------------|---------------------|

REMARKS:

SUMMARY

Item h 1700 Psia  
 P<sub>c</sub> 247 Psia  
 Q 480 MCF/D  
 P<sub>w</sub> 247 Psia  
 P<sub>d</sub> 850 Psia  
 D 393 MCF/D

Company \_\_\_\_\_  
 By Jack D. Cook  
 Title \_\_\_\_\_  
 Witnessed By \_\_\_\_\_  
 Company Engineering & Production Service, Inc.



