ENGINEERING PART OF TESTIMONY

Exhibit "Field BHP History"

Initial pressure Continental part (south portion 3740 - decline rapidly. Last pressure in 1960 av. 1086 psi, but three wells had pressures higher than the original 4-W 3898 psi; 6-W 4000 psi, including those wells, arithmetic average 2092 psi

In comparison, the pressure in the north portion was in 1960 3356 psi, a difference of 2250 psi. It will be shown later in the testimony that the transmissibility of the reservoir rock in the northern part is very high. The presence of a pressure difference of more than 2000 psi proves that these reservoirs cannot be connected.
No flowing wells in south part. 10 flowing wells in the North Anderson Ranch.

Exhibit "Fluid Analyses Comparison"

Two samples taken by Conoco. Both alike. We show only one, since other one is the same.

Exhibit "Pool Description"

Outline of pool to be created. With the exception of NE NE Sec. 32, all these leases are presently in the Anderson Ranch (Wcp.) Pool.

Exhibit "Field History"

Only three wells to 1960, then increase in drilling activity following the successful completion of Union's State #1-33. Presently 11 producing wells and 4 drilling or announced locations.

Exhibit "Interference Test BHP vs. Time" - 2 exhibits - graphical and tabular presentation

Varying choke sizes and parrafin cause variation in production rates.

4. Some flexibility by being able to move within 330' of lease line. Otherwise requested spacing is on staggered 40's.

5. Standard
6. Standard

Exhibit "Allocation of Acreage"

Explanation for Rule two and three.

HUMBLE OIL & REFINING COMPANY STATEMENT
CASE 2507
MARCH 28, 1962

Humble Oil & Refining Company, as a participant in the North Anderson Ranch Unit concurs in Union Oil Company's request for designation of a North Anderson Ranch (Wolfcamp) Pool. Humble recommends the adoption of 80-acre spacing based on interference test data.

In regard to the proposed rules offered by Union Oil Company, Humble believes these rules to be satisfactory with the exception of Rule 3. In the case of existing wells which cannot be assigned 80 acres, it is recommended that the 40-acre proportional factor of 3.77 be adjusted by adding a fraction, the numerator of which is the acreage in excess of 40 acres and the denominator of which is 40 acres, with the resultant factor to be multiplied by the normal unit allowable.

For example, a 50-acre proration unit would receive a factor of

$$\left(3.77 + \frac{50-40}{40}\right) \text{ X NUA, or}$$

$$4.02 \text{ X } 35 = 141 \text{ B/D}$$

By comparison, the originally proposed rule would result in an allowable of

$$\left(3.77 \text{ X } \frac{50}{40}\right) \text{ X NUA, or}$$

$$4.71 \text{ X } 35 = 165 \text{ B/D.}$$

It is respectfully urged that the Commission adopt the proposed rules including the exception proposed herein.

WSD/jn