



# SHELL OIL COMPANY

HOBBS OFFICE OCC

1960 JAN 27 10:54  
Roswell, N. M.

January 26, 1960

Subject: Test for Packer Leakage

New Mexico Oil Conservation Commission  
P. O. Box 2045  
Hobbs, New Mexico

Gentlemen:

Please refer to your letter of January 7 and our letter of January 15 with reference to Shell State C-1 of Section 24, T-21-S, R-35-E. This well is temporarily abandoned with a Sweet HD-200 packer at 3640' separating the Eumont oil zone and the Monument gas zone. The flow line was removed from this well when it was temporarily abandoned in 1957.

In compliance with a telephone request by your Mr. Engbrecht that a test be made on State C-1 for packer leakage, the following data were obtained on January 21:

1. A bottom hole pressure bomb run through tubing indicated a static pressure of 678 psi at 3640'. The surface shut in tubing pressure was 621 psi.
2. The fluid level in the casing was determined by sonic means to be at 1470'. Surface shut in casing pressure was 643 psi. Gas gravity was 0.667. Oil gravity was 26.3° API with a pressure gradient of 0.388 psi per foot. The bottom hole pressure at 3640' in the casing was calculated to be 1509 psi.

In our opinion, a comparison of the bottom hole pressures in the tubing and casing annulus (678 psi versus 1509 psi) indicates no packer leakage at this time. We trust this information fulfills the requirements for a packer leakage test on State C-1 and with your consent will plan to submit a similar test annually.

Very truly yours,

P. A. Dennie  
Division Production Manager