

ARAPAHOE DRILLING CO.

P. O. BOX 26687

ALBUQUERQUE, NEW MEXICO 87125

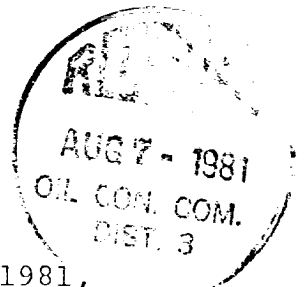
JOHN E. SCHALK
MANAGING PARTNER

June 1, 1981

Gulf Oil Corporation
Apache Federal #13E
Section 7, Township 24 North, Range 5 West
Rio Arriba County, New MexicoDEVIATION RECORD

DATE	DEPTH	DEVIATION
3/24/81	525'	1/4°
3/25/81	1228'	1/2°
3/26/81	1720'	1/2°
3/26/81	2232'	1°
3/27/81	2800'	1°
3/28/81	3326'	1°
3/29/81	3883'	1°
3/29/81	4256'	1°
3/30/81	4282'	1-1/4°
3/31/81	5278'	1-1/4°
4/01/81	5520'	1°
4/04/81	6051'	1-1/4°
4/05/81	6575'	1-1/4°

Arapahoe Drilling Co.

John E. Schalk
Managing PartnerState of New Mexico
County of BernalilloSubscribed and sworn to this 8TH day of June, 1981,
by John E. Schalk, Managing Partner of Arapahoe Drilling
Co.OFFICIAL SEAL
LOIS CUNNINGHAM
NOTARY PUBLIC - NEW MEXICO
Notary Bond Filed with Secretary of State
My Commission Expires: 3/7/83
Notary Public