MERIDIAN OIL

To: Tom Kellahin   January 4, 1995

From: Leonard J. Biemer Jr.

Re: NMOCD Case #11148
       Zachry #1
       SE/SW Section 12, T-28-N, R-10-W
       San Juan County, New Mexico

The Zachry #1 has an estimated remaining reserves of 369,089 Mcf in the Pictured Cliffs formation. The Pictured Cliffs reserves can not be economically recovered with a dual completion because of the additional cost associated with this type of completion. The following are a few of the additional costs; 1) a second string of tubing, 2) a packer, 3) a dual wellhead, 4) an additional separator, 5) an additional meter run, 6) additional pipeline, 7) labor to install the field facilities and 8) rig time to do the work. By Meridian incurring these additional costs to dual complete the well, the Zachry #1 will drop out as an economicly viable project.

If you have any questions, please call me at 505-326-9703. Thank You.

Leonard J. Biemer Jr.

catanach.doc
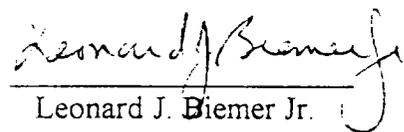
ZACHRY #1
SE/SW 12-28N-10W
MONTHLY GAS PRODUCTION ALLOCATION FORMULA

GENERAL EQUATION

$$Qt = Qftc + Qpc$$

WHERE: **Qt**   =   Total Monthly Production   (Mcf / Month)

          Qftc   =   Fruitland Coal (ftc) Monthly Production   (Mcf / Month)

          Qpc   =   Pictured Cliffs (pc) Monthly Production   (Mcf / Month)

Rearranging the Equation to Solve for **Qftc**:

$$Qftc = Qt - Qpc$$

Any Production Rate Over What is Calculated for the Pictured Cliffs (Qpc), Using the Applied Formula is Fruitland Coal Production (Qftc).

The Pictured Cliffs (Qpc) Formation Production Formula is:

$$Qpc = Qpci \times e^{\{-(Dpc) \times (t)\}}$$

WHERE: **Qpci**   =   Pictured Cliffs Initial Monthly Rate   =   **<u>1107 Mcf/M</u>**   (Determined from the attached decline curve)

          Dpc   =   Pictured Cliffs Monthly Decline Rate Calculated from Decline Curve and Material Balance Analysis:

          Dpc   =   **(0.0021/M)**

THUS: **Qftc**   = $Qt - Qpci \times e^{\{-(0.0021) \times (t)\}}$

NOTE: **(t)** is in Months

REFERENCE: Thompson, R. S., and Wright, J. D., "Oil Property Evaluation", pages 5-2, 5-3, 5-4.

ZACHRY : 1 : : PICTURED CLIFFS

Prop 48 *

● ×GAS Mcf/d
○ °OIL Bbl/d
○ +OIL/GAS
○ ·WATER Bbls/d
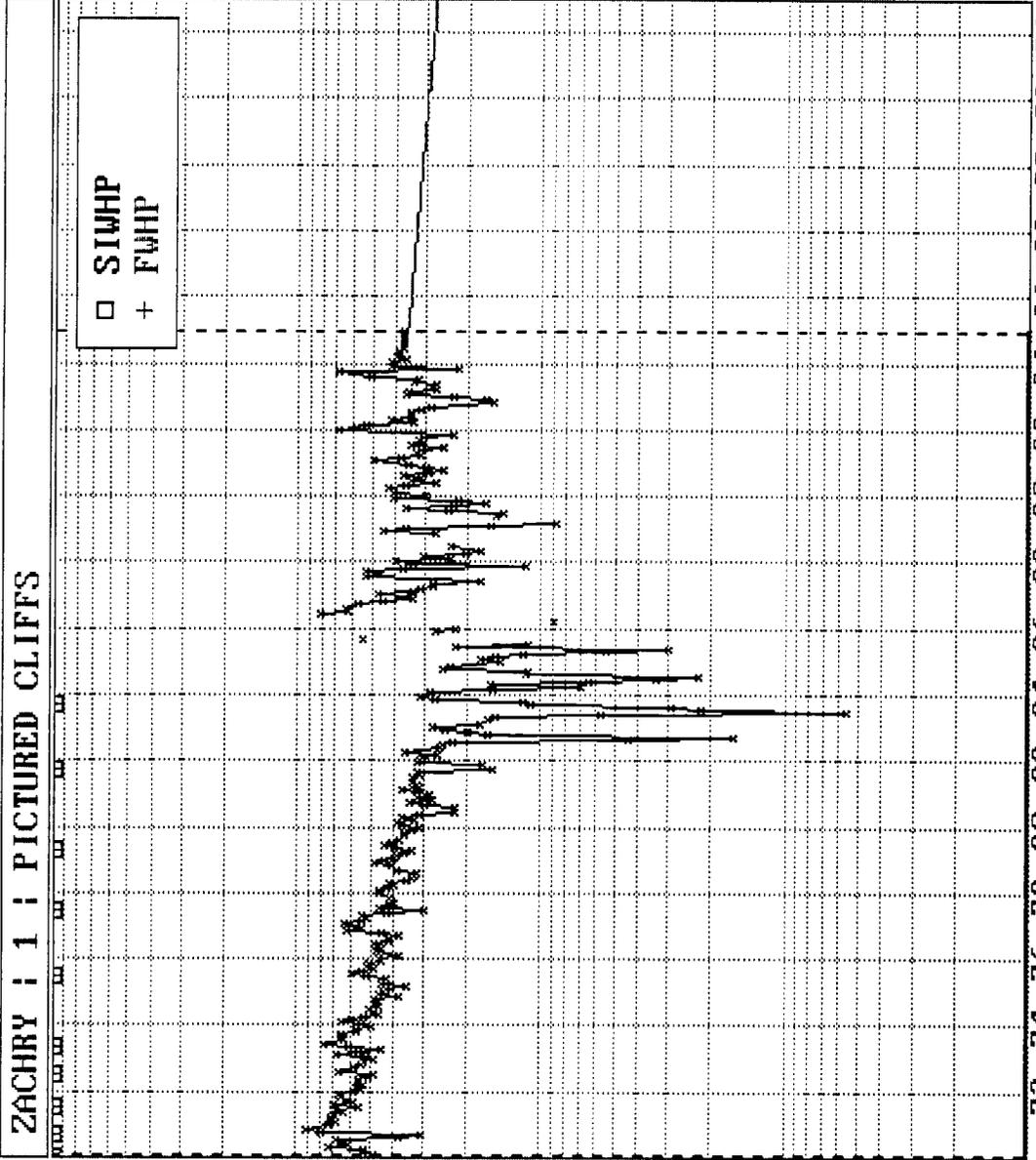
			RateTime Semi Log
EUR	1,363,049		
Cum	993,960		
Rem	369,089		
Rem%	27.1%		
Yrs	50.33		
Date	1/1/1955		
Act	0		
Qmo	1,107		
q	35.8		
n	0		
De	2.527		
Qab	10		
GetQual	95PDP		

Major = GAS

□ SIWHP
+ FWHP