



(SUBMIT IN TRIPLICATE)

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

Land Office Santa Fe
Lease No. 079045
Unit Northeast Blance
Unit Agreement No. 1, Sec. 929

SUNDRY NOTICES AND REPORTS ON WELLS

NOTICE OF INTENTION TO DRILL.....	SUBSEQUENT REPORT OF WATER SHUT-OFF.....
NOTICE OF INTENTION TO CHANGE PLANS.....	SUBSEQUENT REPORT OF SHOOTING OR ACIDIZING.....
NOTICE OF INTENTION TO TEST WATER SHUT-OFF.....	SUBSEQUENT REPORT OF ALTERING CASING.....
NOTICE OF INTENTION TO RE-DRILL OR REPAIR WELL.....	SUBSEQUENT REPORT OF RE-DRILLING OR REPAIR.....
NOTICE OF INTENTION TO SHOOT OR ACIDIZE.....	SUBSEQUENT REPORT OF ABANDONMENT.....
NOTICE OF INTENTION TO PULL OR ALTER CASING.....	SUPPLEMENTARY WELL HISTORY.....
NOTICE OF INTENTION TO ABANDON WELL.....	<u>Subsequent Report of Sand-Water Frac</u>

(INDICATE ABOVE BY CHECK MARK NATURE OF REPORT, NOTICE, OR OTHER DATA)

MESAVERDE - DAKOTA DUAL

September, 19 59

Well No. 57-21 is located 860 ft. from (N) line and 1630 ft. from (E) line of sec. 21

NW/4 Sec. 21
(1/4 Sec. and Sec. No.)

31N
(Twp.)

7W
(Range)

NMPH
(Meridian)

Blance Mesaverde-Dakota
(Field)

San Juan
(County or Subdivision)

New Mexico
(State or Territory)

The elevation of the derrick floor above sea level is 6405 ft.

DETAILS OF WORK

(State names of and expected depths to objective sands; show sizes, weights, and lengths of proposed casings; indicate mudding jobs, cementing points, and all other important proposed work)

On 9/11/59, perforated the Dakota Zone thru 3/4" casing with 4 holes per foot 7779'-7810', 7820'-7836' & 7848'-7880' Sand-water fraced with 53,760 gallons of water (including flush) and 36,235 lbs of sand. Maximum treating pressure 2900 PSI. Minimum treating pressure 2300 PSI. Final pressure 2600 PSI. Average injection rate 25 barrels per minute.
On 9/13/59, refraced the Dakota Zone thru previous perforations with 22,000 gallons of water (including flush) & 6000 lbs of sand. Maximum treating pressure 3000 PSI. Minimum treating pressure 3000 PSI. Final pressure 2600 PSI. Average injection rate 15 barrels per minute. Formation sandd off.

Cleaned up Dakota Formation and, on 9/14/59, set retainer at 7690' & loaded hole with water. Set retainer at 5640' and perforated the Point Locket Formation thru 3/4" casing with 2 holes per foot 5501'-5531', 5556'-5578' & 5584'-5609'. Sand-water fraced with 60,300 gallons of water (including flush) and 40,000 lbs of sand. Injected 30 rubber balls during treatment. Maximum treating pressure 1600 PSI. Minimum treating pressure 1400 PSI. (over)

I understand that this plan of work must receive approval in writing by the Geological Survey before operations may be commenced.

Company BLACKWOOD & NICHOLS COMPANY

Address P.O. BOX 1237

DURANGO, COLORADO

Original Signed
By Delasso Lees
Title Field Superintendent

Final pressure Zero PSI. Average injection rate 50 barrels per minute.
Set retainer at 5490' and perforated the Manatee & Cliffhouse Zones thru 3/4" casing
with 2 holes per foot 5391'-5394', 5399'-5315', 5343'-5360', 5395'-5427', 5439'-5454',
5459'-5470' & 5479'-5486'. Sand-water fraced with 63,000 gallons of water (including
flush) and 40,000 lbs of sand. Injected 70 rubber balls during treatment. Maximum
treating pressure 1750 PSI. Minimum treating pressure 1700 PSI. Final pressure Zero PSI
Average injection rate 43.4 barrels per minute.