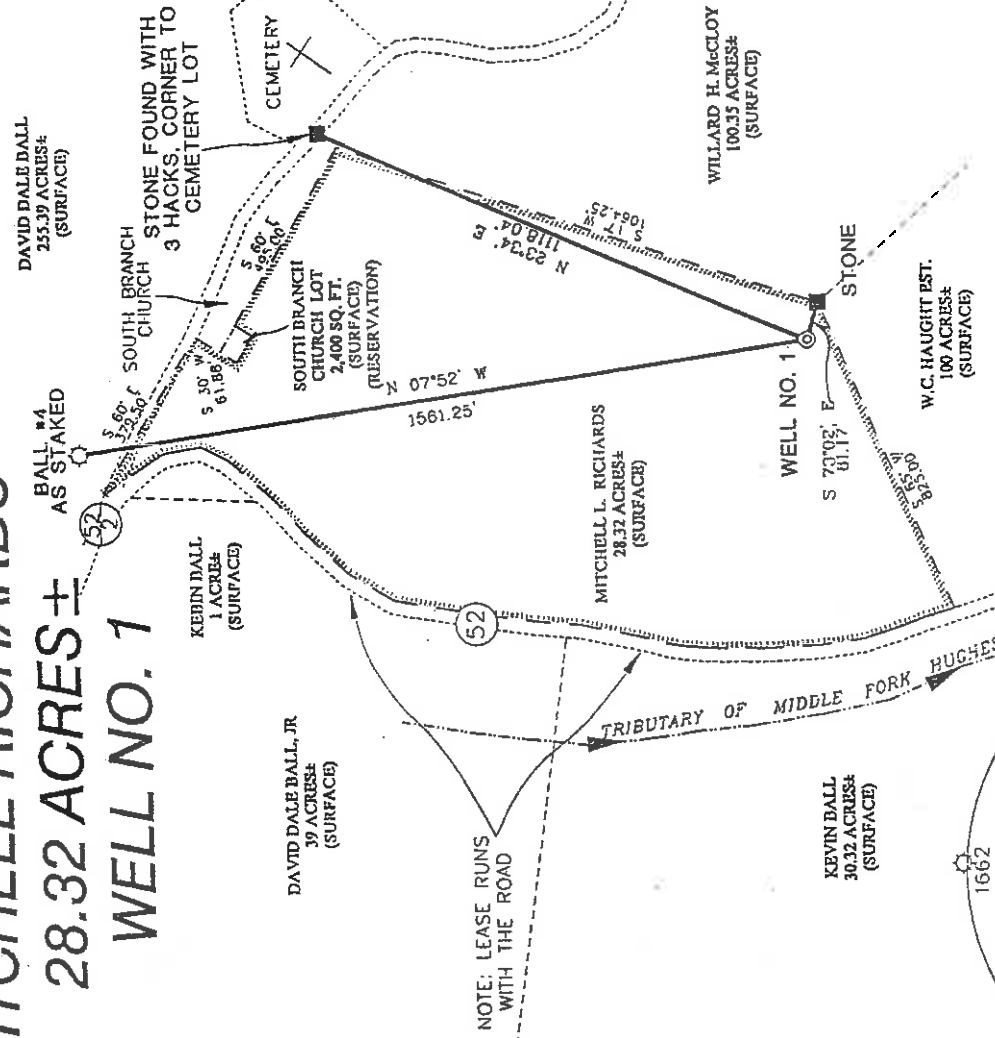


MITCHELL RICHARDS

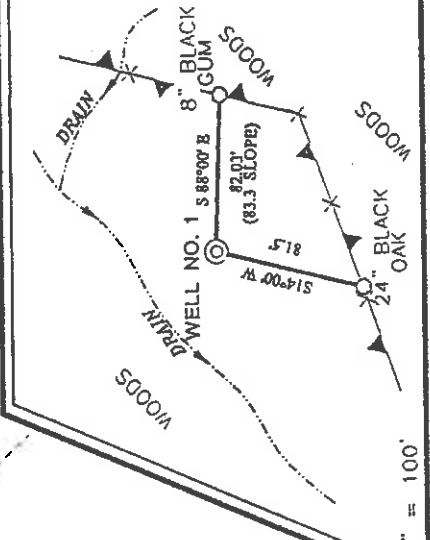
28.32 ACRES ± WELL NO. 1

LONG. 80°50'26.4" - 2.070'
LATITUDE 39°10'00"
LAT. 39°09'48.0" - 1.250'
LONGITUDE 80°50'00"



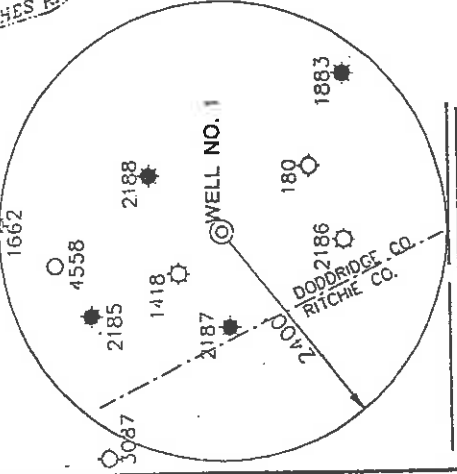
0.24
0.39

REFERENCES



NOTES ON SURVEY

1. TIES TO WELLS AND CORNERS ARE BASED ON STATE PLANE GRID NORTH WV NORTH ZONE NAD '27.
2. TIES TO REFERENCES ARE BASED ON MAGNETIC NORTH 6/8/01.
3. LEASE BOUNDARY SHOWN HEREON TAKEN FROM DEED BOOK 232 PAGE 677.
4. SURFACE OWNER AND ADJOINER INFORMATION TAKEN FROM THE ASSESSOR AND COUNTY CLERK RECORDS OF DODDRIDGE COUNTY IN JUNE, 2001.
5. WELL LAT./LONG. ESTABLISHED BY DGPS(SUBMETER MAPPING)



I THE UNDERSIGNED, HEREBY CERTIFY THAT THIS PLAN IS CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF AND SHOWS ALL THE INFORMATION REQUIRED BY LAW AND THE REGULATIONS ISSUED AND PRESCRIBED BY THE DEPARTMENT OF ENVIRONMENTAL PROTECTION.

P.S. 677 *Gregory A. Smith*

(+) DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS.
DATE JUNE 8 20 01
OPERATORS WELL NO. MITCHELL RICHARDS/1

WELL NO. 47-17 STATE COUNTY PERMIT
04616

STATE OF WEST VIRGINIA
DIVISION OF ENVIRONMENTAL PROTECTION
OFFICE OF OIL AND GAS

MINIMUM DEGREE OF ACCURACY 1 / 200 FILE NO. 4779(109-B)
PROVEN SOURCE OF ELEVATION 1" = 400'
JUNCTION OF ROADS 1051'

WELL TYPE : OIL GAS LIQUID WASTE INJECTION DISPOSAL IF "GAS" PRODUCTION STORAGE DEEP SHALLOW

LOCATION : ELEVATION 966' WATERSHED TRIBUTARY OF MIDDLE FORK OF HUGHES RIVER
DISTRICT SOUTHWEST COUNTY DODDRIDGE QUADRANGLE OXFORD 7.5'

SURFACE OWNER MITCHELL L. & CYNTHIA F. RICHARDS ACREAGE 28.32±
ROYALTY OWNER MITCHELL L. & CYNTHIA F. RICHARDS LEASE ACREAGE 28.32±
LEASE NO. _____

PROPOSED WORK :
DRILL CONVERT DRILL DEEPER REDRILL FRACTURE OR STIMULATE PLUG OFF OLD FORMATION PERFORATE NEW FORMATION PLUG AND ABANDON CLEAN OUT AND REPLUG OTHER
PHYSICAL CHANGE IN WELL (SPECIFY) _____ TARGET FORMATION ALEXANDER
ESTIMATED DEPTH 5,600'

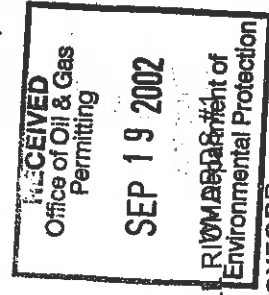
WELL OPERATOR KEY OIL COMPANY DESIGNATED AGENT JAN CHAPMAN
ADDRESS 22 GARTON PLAZA WESTON, WV 26452

PERMIT 4616
156 07 2011

6-6 133

AP-13

State of West Virginia
Division of Environmental Protection
Section of Oil and Gas



Well Operator's Report of Well Work

Farm Name: MITCHELL L. & CYNTHIA F. RICHARDS

Operator Well No.: MITCHELL RICHARDS

Quadrangle: OXFORD

LOCATION: Elevation: 966.00

District: SOUTHWESTL
Latitude: 1,1250 Feet South of 39 Deg. 10 Min. 00 Sec.
Longitude: 2,070 Feet West of 80 Deg. 50 Min. 00 Sec.

County: DODDRIDGE

Company: KEY OIL COMPANY
22 GARTON PLAZA
WESTON, WV 26452-0000

Agent: JAN E. CHAPMAN

Inspector: MIKE UNDERWOOD
Permit Issued: 12/04/01
Well Work Commenced: 08/01/02
Well Work Completed: 08/05/02

Verbal Plugging
Permission granted on: _____ Rig
Rotary X Cable _____
Total Depth (feet) 5115'
Fresh water depths (ft) 43'
Salt water depths (ft) 1066'

Is coal being mined in area (Y / N) ? N
Coal Depths (ft): NONE

OPEN FLOW DATA

Casing & Tubing Size	Used in Drilling	Left In Well	Cement Fill Up Cu. Ft.
11 3/4"	123'	123'	65 sks To Surface
8 5/8"	1723'	1723'	380 sks To Surface
4 1/2"	5066'	5066'	300 sks To Surface

Producing formation Rileys
Gas: Initial open flow _____ MCF / d
Final open flow 1,492 MCF / d
Time of open flow between initial and final tests N/A
Static rock pressure 1980 psig (surface pressure) after 96 Hours

Second producing formation Commingled
Gas: Initial open flow _____ MCF / d
Final open flow _____ MCF / d
Time of open flow between initial and final tests _____ Hours
Static rock pressure _____ psig (surface pressure) after _____ Hours

NOTE: ON BACK OF THIS FORM PUT THE FOLLOWING: 1). DETAILS OF PERFORATED INTERVALS, FRACTURING OR STIMULATING, PHYSICAL CHANGE, ETC. 2). THE WELL LOG WHICH IS A SYSTEMATIC DETAILED GEOLOGICAL RECORD OF ALL FORMATIONS, INCLUDING COAL ENCOUNTERED BY THE WELLBORE.

For: KEY OIL COMPANY
By: *[Signature]*
Date: September 3, 2002

OCT 18 2002
PRESIDENT

DOOP 4616

Mitchell Richards #1 (47-017 - 4616)
 Three Stage Foam Frac - BJ Services

1st Stage: Alexander (14 holes) (4929.75' to 5002.50') 60 Quality Foam. 500 gal. 15% HCL.
 60,000# 20/40 sand; 550,000 SCF N2,
 812 bbis foam.

2nd Stage: Benson (6 holes) (4649.50' to 4650.75') 60 Quality Foam. 750 gal 15% HCL.
 Third Riley (7 holes) (4575.25' to 4576.75') 35,000# 20/40 sand, 390,000 SCF N2,
 569 bbis foam.

3rd Stage: Riley (13 holes) (4242.25' to 4266.75') 60 Quality Foam. 750 gal 15% HCL.
 5,000# 80/100 sand, 25,000# 20/40 sand,
 380,000 SCF N2, 518 bbis foam.

WELL LOG

KB-GL	0	10	
Fill	10	12	
Sand	12	20	
Shale & Red Rock	20	85	Water @ 43'
Sand & Shale	85	150	
Red Rock	150	179	
Sand & Shale	179	520	
Red Rock	520	587	
Sand & Shale	587	746	
Sand	746	830	
Sand & Shale	830	1100	Damp @ 1066'
Sand	1100	1140	
Red Rock	1140	1165	
Sand & Shale	1165	1282	
Red Rock	1282	1296	
Sand & Shale	1296	1359	
Sand	1359	1376	
Sand & Shale	1376	1690	
Little Lime	1690	1730	
Big Lime	1730	1776	
Big Injun	1776	1850	
Sand & Shale	1850	2008	
Weir	2008	2139	
Shale & Siltstone	2139	2201	
Berea	2201	2210	
Shale	2210	3086	
Warren	3086	3126	Gas Checks
Shale	3126	3139	2060' - Odor
Speechley	3139	3244	3102' - Odor
Shale	3244	3432	3918' - Odor
Balltown	3432	4058	4329' - Odor
Shale	4058	4206	4706' - Odor
Riley	4206	4280	4896' - Odor
Shale	4280	4539	
Third Riley	4539	4600	
Shale	4600	4646	
Benson	4646	4655	
Shale	4655	4894	
Alexander	4894	4988	
Sand & Shale	4988	5115	
T.D	5115		