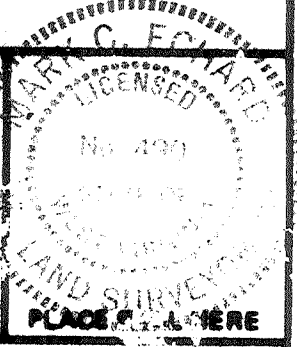


FILE NO. \_\_\_\_\_  
 DRAWING NO. \_\_\_\_\_  
 SCALE 1 inch = 1000 feet  
 MINIMUM DEGREE OF ACCURACY 1/200  
 PROVEN SOURCE OF ELEVATION Top Knob 1300' NE of Location Elev. = 1182'

I THE UNDERSIGNED, HEREBY CERTIFY THAT THIS PLAT 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 MINES.  
 (SIGNED) Mark C. Echard  
 MARK C. ECHARD  
 R.P.E. \_\_\_\_\_ L.L.S. 480



(+) DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS  
 FORM IV-B (8-78)



DATE November 5, 1980  
 OPERATOR'S WELL NO. THREE  
 API WELL NO. 47-017-02876-7  
 STATE WEST VIRGINIA COUNTY DEDDRIDGE PERMIT \_\_\_\_\_

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

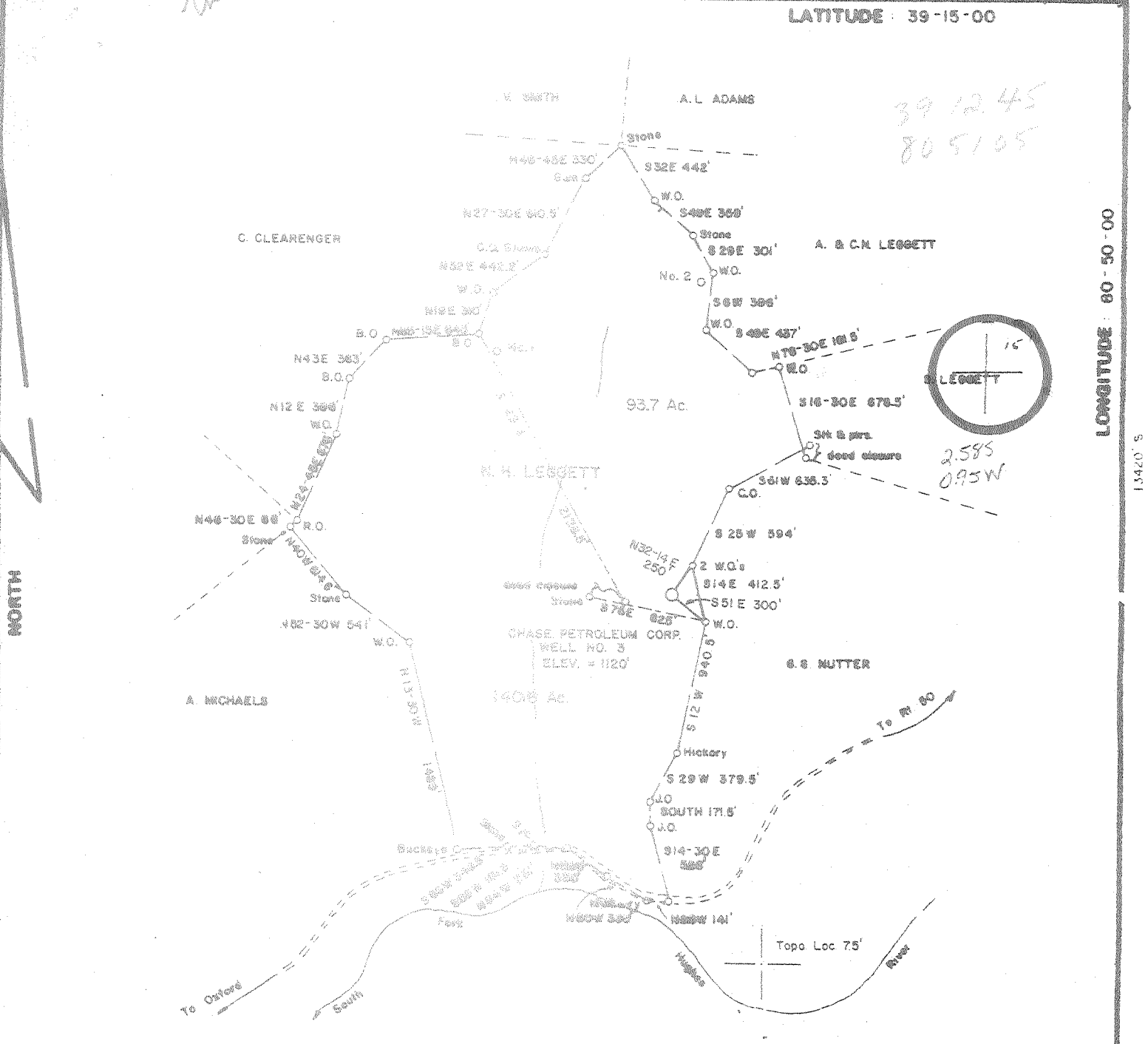
WELL TYPE: OIL  GAS  LIQUID INJECTION  WASTE DISPOSAL   
 (IF "GAS") PRODUCTION  STORAGE  DEEP  SHALLOW   
 LOCATION: ELEVATION 1120' WATER SHED South Fork of Hughes River  
 DISTRICT South COUNTY Deddrige  
 QUADRANGLE Oxford 7.5'

SURFACE OWNER N. H. Leggett ACREAGE 234.5  
 OIL & GAS ROYALTY OWNER N. H. Leggett, et al LEASE ACREAGE 93.7  
 LEASE NO. \_\_\_\_\_

PROPOSED WORK: DRILL  CONVERT  WELL DEEPER  REFRILL  FRACTURE OR STIMULATE  PLUG OLD FORMATION  PERFORATE NEW FORMATION  OTHER PHYSICAL CHANGE IN WELL (SPECIFY) \_\_\_\_\_  
Set Temporary Plug face Riley & Calloway complete work existing  
 PLUG AND ABANDON  CLEAN OUT AND REPLUG   
 TARGET FORMATION ALEXANDER ESTIMATED DEPTH 3800 5525' Production

Meridian Exploration Corporation  
 Penn Center West Two, Suite 325  
 Pittsburgh, Pa. 15276  
 C.T. Corp. System  
 1200 Charleston Nat'l Plaza  
 Charleston, W.Va. 25301

39 12.45  
80 51.05



LONGITUDE : 80-50-00

13420 S

FILE NO. \_\_\_\_\_  
DRAWING NO. \_\_\_\_\_  
SCALE 1 inch = 1000 feet  
MINIMUM DEGREE OF ACCURACY 1/200  
PROVEN SOURCE OF ELEVATION Top Knob 1300' NE of Location Elev. = 1182'

I THE UNDERSIGNED, HEREBY CERTIFY THAT THIS PLAT IS CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF AND SHOWS ALL THE INFORMATION REQUIRED BY LAW AND THE REGULATIONS HEREIN AND PRESCRIBED BY THE DEPARTMENT OF MINES  
*Mark C. Echard*  
MARK C. ECHARD  
L.L.E. 480

PLACE SEAL HERE

(+) DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS  
FORM IV-B (8-78)



DATE November 5, 1980  
OPERATOR'S WELL NO. THREE  
API WELL NO. \_\_\_\_\_  
47 - 017 - 2876  
STATE COUNTY PERMIT

STATE OF WEST VIRGINIA  
DEPARTMENT OF MINES  
OIL AND GAS DIVISION

WELL TYPE: OIL \_\_\_ GAS  LIQUID INJECTION \_\_\_ WASTE DISPOSAL \_\_\_  
(IF 'GAS.') PRODUCTION  STORAGE \_\_\_ DEEP \_\_\_ SHALLOW   
LOCATION: ELEVATION 1120' WATER SHED South Fork of Hughes River  
DISTRICT Southw. of COUNTY Doddridge  
QUADRANGLE Oxford 75' Northw. 15' N.C.  
SURFACE OWNER N. H. Leggett ACREAGE 234.5  
OIL & GAS ROYALTY OWNER N. H. Leggett, et al LEASE ACREAGE 93.7  
LEASE NO. \_\_\_\_\_  
PROPOSED WORK: DRILL  CONVERT \_\_\_ DRILL DEEPER \_\_\_ REDRILL \_\_\_ FRACTURE OR STIMULATE \_\_\_ PLUG OFF OLD FORMATION \_\_\_ PERFORATE NEW FORMATION \_\_\_ OTHER PHYSICAL CHANGE IN WELL (SPECIFY) \_\_\_\_\_  
PLUG AND ABANDON \_\_\_ CLEAN OUT AND REPLUG \_\_\_  
TARGET FORMATION ALEXANDER ESTIMATED DEPTH 5800'  
WELL OPERATOR CHASE PETROLEUM CORP. DESIGNATED AGENT MR. ALTON SKINNER  
ADDRESS BOX 297 GLENVILLE, W.V. 26361 ADDRESS BOX 297 GLENVILLE, W.V. 26361  
DEC 19 1980

6-6'Straight Fork-Bluestone Creek (133)



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

Permitting  
Office of Oil & Gas Well Operator's Report of Well Work

Farm name: LEGGETT, ELMA Operator Well No.: STINESPRING #3

LOCATION: Elevation: 1,040.00 Quadrangle: OXFORD

District: SOUTHWEST County: DODDRIDGE  
Latitude: 13420 Feet South of 39 Deg. 15Min. 0 Sec.  
Longitude 4925 Feet West of 80 Deg. 50 Min. 0 Sec.

Company: MERIDIAN EXPLORATION CORP  
PENN CENTER WEST TWO, STE 325  
PITTSBURGH, PA 15276-0000

Agent: CT CORP. SYSTEM

Inspector: MIKE UNDERWOOD  
Permit Issued: 08/14/96  
Well work Commenced: 8/15/96  
Well work Completed: 9/5/96  
Verbal Plugging \_\_\_\_\_  
Permission granted on: \_\_\_\_\_  
Rotary Cable \_\_\_\_\_ Rig \_\_\_\_\_  
Total Depth (feet) 5525  
Fresh water depths (ft) 110

Salt water depths (ft) None

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

Casing & Tubing Size	Used in Drilling	Left in Well	Cement Fill Up Cu. Ft.
1 3/4"	30	0	
8 5/8"	1455	1455	CTS
4 1/2"	5401	5401	3400'
2"		5200'	

OPEN FLOW DATA

Producing formation Riley Pay zone depth (ft) 4152'  
Gas: Initial open flow 800 MCF/d Oil: Initial open flow - Bbl/d  
Final open flow 800 MCF/d Final open flow - Bbl/d  
Time of open flow between initial and final tests 0 Hours  
Static rock Pressure 1100 psig (surface pressure) after 24 Hours

Second producing formation Balltown Pay zone depth (ft) 3796'  
Gas: Initial open flow 800 MCF/d Oil: Initial open flow - Bbl/d  
Final open flow 800 MCF/d Final open flow - Bbl/d  
Time of open flow between initial and final tests 0 Hours  
Static rock Pressure 1100 psig (surface pressure) after 24 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: MERIDIAN EXPLORATION CORP.

By: John Guide John Guide  
Date: 1/6/97

## OPEN FLOW DATA

Producing Formation - Speechley. Pay Zone depth (ft) 3412'-3432'  
Gas: Initial Open flow 800 MCF/d  
Final Open flow 800 MCF/d  
Time of open flow between Initial and final tests - 0 hrs  
Static Rock Pressure - 1100 psig (surface pressure) after 24 hrs

RILEY: Perforations: 4152 - 4172' 4 SPF

Fracture  
Treatment: 20,600 lbs 20/40 Sand X-Link Gel  
(0) Zero Nitrogen  
250 bbls water

BALLTOWN: Perforations: 3,796' - 3,816' 4 SPF

Fracture  
Treatment: 17,700 lbs 20/40 Sand X-Link Gel  
(0) Zero Nitrogen  
250 bbls water

SPEECHLEY: Perforations 3412' - 3432' 4 SPF

Fracture  
Treatment: 19,300 lbs 20/40 Sand X-Link Gel  
(0) Zero Nitrogen  
250 bbls water.



STATE OF WEST VIRGINIA  
DEPARTMENT OF MINES  
Oil and Gas Division  
WELL RECORD

RECEIVED

AUG 25 1981

OIL AND GAS DIVISION  
WV DEPARTMENT OF MINES

Rotary  Oil \_\_\_\_\_  
Cable \_\_\_\_\_ Gas   
Recycling \_\_\_\_\_ Comb \_\_\_\_\_  
Water Flood \_\_\_\_\_ Storage \_\_\_\_\_  
Disposal \_\_\_\_\_ (Kind)

Quadrangle Oxford 7.5  
Permit No. 47-017-2876

Company Chase Petroleum  
Address Drawer 369, Glenville, WV 26351  
Farm N.H. Leggett, et al Acres 93.7  
Location (waters) South Fork of Hughes River  
Well No. Stinespring #3 Elev. 1120  
District Southwest County Doddridge  
The surface of tract is owned in fee by N.H. Leggett, et al  
Address Oxford, WV 26414  
Mineral rights are owned by N.H. Leggett, et al  
Address Oxford, WV  
Drilling Commenced March 20, 1981  
Drilling Completed March 27, 1981  
Initial open flow 125,000 cu. ft. 0 bbls.  
Final production 180,000 cu. ft. per day 0 bbls.  
Well open 10 hrs. before test 1725 RP.

Casing and Tubing	Used in Drilling	Left in Well	Cement fill up Cu. ft. (Sks.)
Size 20-16			
Cond.			
13-10" 11 3/4	30	0	
9 5/8			
8 5/8 23#	1454.9	1454.9	CTS
7			
5 1/2			
4 1/2 10.5#	5401	5401	700 Sks
3			
2			
Liners Used			

Well treatment details:

Attach copy of cementing record. **180 MCF**

Fraced Alexander; 5238-5284; 16 holes; 654 bbls. Total Fluid: 20,000 # 80/100  
60,000 # 20/40  
Fraced Benson; 4780-4968; 15 holes; 479 bbls. Total Fluid: 20,000 # 80/100  
50,000 # 20/40  
Fraced Riley; 4460-4586; 16 holes; 628 bbls. Total Fluid: 20,000 # 80/100  
60,000 # 20/40

Coal was encountered at None Feet \_\_\_\_\_ Inches \_\_\_\_\_  
Fresh water 110 Feet \_\_\_\_\_ Salt Water -- Feet \_\_\_\_\_  
Producing Sand Alexander; Benson; Riley Depth 5238-5284; 4780-4968; 4460-4586

Formation	Color	Hard or Soft	Top Feet	Bottom Feet	Oil, Gas or Water	Remarks
Cond.			G.L.	50		
Sand			50	62		
Shale & Red Rock			62	90		
Sand & Shale			90	106		
Sand			106	127		
Sand & Shale			127	140		
Black Shale			140	148		
Sand			148	172		
Shale & Red Rock			172	185		
Sand			185	189		
Sand & Shale			189	204		
Shale			204	219		
Sand & Shale			219	263		
Red Rock & Shale			263	292		
Sand			292	300		
Shale			300	313		
Red Rock & Shale			313	342		
Sand & Shale			342	372		
Red Rock & Shale			372	390		
Sand & Shale			390	412		
Shale			412	428		
Sand & Shale			428	439		
Lime			439	443		
Sand & Shale			443	452		

SEP 9 1981

(over)

Indicates Electric Log logs in the remarks section.

Formation	Color	Hard or Soft	Top Feet	Bottom Feet	Oil, Gas or Water	° Remarks
Shale & Red Rock			452	556		
Sand & Shale			556	565		
Shale & Red Rock			565	586		
Sand & Shale			586	630		
Shale			630	705		
Sand			705	713		
Lime			713	717		
Shale & Red Rock			717	948		
Sand			948	950		
Shale			950	1190		
Sand			1190	1197		
Shale			1197	1212		
Sand			1212	1228		
Shale			1228	1238		
Sand			1238	1245		
Shale			1245	1255		
Sand			1255	1260		
Shale			1260	1280		
Sand			1280	1286		
Shale			1286	1289		
Sand			1289	1318		
Shale			1318	1355		
Sand			1355	1397		
Shale			1397	1420		
Sand			1420	1425		
Shale			1425	1435		
Sand			1435	1456		
Shale			1456	1462		
Sand			1462	1481		
Sand & Shale			1481	1738		
Sand			1738	1747		
Shale			1747	1800		
Sand			1800	1825		
Sand & Shale			1825	1877		
Shale			1877	1906		
Sand & Shale			1906	1923		
Shale			1923	1964		
Little Lime			1964	1978		
Sand & Shale			1978	1984		
Sand			1984	1997		
Shale			1997	2002		
Big Lime			2002	2070		
Sand & Shale			2070	2075		
Injun Sand			2075	2135		
Sand & Shale			2135	3720		
Shale			3720	4950		
Benson			4950	4954		
Sand & Shale			4954	5145		
Sand			5145	5157		
Sand & Shale			5157	5197		
Sand			5197	5208		
Sand & Shale			5208	5227		
Sand (Alexander)			5227	5300		
Sand & Shale			5300	5525	TD	

Date Apr 21 19 81

APPROVED Alton Shuman Owner

STATE OF WEST VIRGINIA  
DEPARTMENT OF ENERGY, DIVISION OF OIL AND GAS  
WELL WORK PERMIT APPLICATION

22383

- 1) Well Operator: MERIDIAN EXPLORATION CORP. 31805 (7) 526
- 2) Operator's Well Number: STINESPRING #3 (1569)  
47 017 2876
- 3) Elevation: 1040
- Well type: (a) Oil    / or Gas X
- (b) If Gas: Production X / Underground Storage     
Deep    / Shallow
- Proposed Target Formation(s): Riley @ 4150' & Balltown @ 3,800'
- Proposed Total Depth: 5,525 feet
- 1) Approximate fresh water strata depths: 110'
- 8) Approximate salt water depths: None
- 9) Approximate coal seam depths: None
- 10) Does land contain coal seams tributary to active mine? Yes    / No X
- 11) Proposed Well Work: Set Plug. Perf & Frac Riley @ 4150', Perf + Frac Balltown @ 3,800'. Drill Plug
- 12)

Issued 08/14/96  
Expires 08/14/98

CASING AND TUBING PROGRAM

TYPE	SPECIFICATIONS			FOOTAGE INTERVALS		CEMENT
	Size	Grade	Weight per ft.	For drilling	Left in well	Fill-up (cu. ft.)
Conductor	11 3/4"	-	-	30		
Fresh Water						
Coal						
Intermediate	8 5/8"	-	23	1455	1455	CTS
Production	4 1/2"	-	10.5	5401	5401	3400'
Tubing						
Liners						

PACKERS : Kind N/A  
Sizes \_\_\_\_\_  
Depths set \_\_\_\_\_

For Division of Oil and Gas Use Only

Fee(s) paid:  Well Work Permit  Reclamation Fund  WPCP  
 Plat  WW-9  WW-2B  Bond Blanket (Type)  Agent

Page 1 of \_\_\_\_\_  
Form WW2-A  
(09/87)  
Permit Copy

1) Date: 6-14-96  
2) Operator's well number  
STINESPRING #3 (1569)  
3) API Well No: 47 - 017 - 2876  
State - County - Permit

STATE OF WEST VIRGINIA  
DEPARTMENT OF ENERGY, DIVISION OF OIL AND GAS

NOTICE AND APPLICATION FOR A WELL WORK PERMIT

4) Surface Owner(s) to be served:  
(a) Name ELMA LEGGETT  
Address ROUTE 1 BOX 87  
WEST UNION, WV 26456  
(b) Name ROY LEGGETT  
Address ROUTE 1  
WEST UNION, WV 26456  
(c) Name \_\_\_\_\_  
Address \_\_\_\_\_

5) (a) Coal Operator:  
Name NO COAL  
Address \_\_\_\_\_  
(b) Coal Owner(s) with Declaration  
Name \_\_\_\_\_  
Address \_\_\_\_\_  
Name \_\_\_\_\_  
Address \_\_\_\_\_

6) Inspector MIKE UNDERWOOD  
Address ROUTE 2 BOX 135  
SALEM, WV 26426  
Telephone (304)-782 1043

(c) Coal Lessee with Declaration  
Name \_\_\_\_\_  
Address \_\_\_\_\_

TO THE PERSON(S) NAMED ABOVE TAKE NOTICE THAT:

Included is the lease or leases or other continuing contract or contracts by which I hold the right to extract oil and gas OR  
 Included is the information required by Chapter 22B, Article 1, Section 8(d) of the Code of West Virginia (see page 2)  
I certify that as required under Chapter 22B of the West Virginia Code I have served copies of this notice and application, a location plat, and accompanying documents pages 1 through \_\_\_ on the above named parties, by:  
 Personal Service (Affidavit attached)  
 Certified Mail (Postmarked postal receipt attached)  
 Publication (Notice of Publication attached)

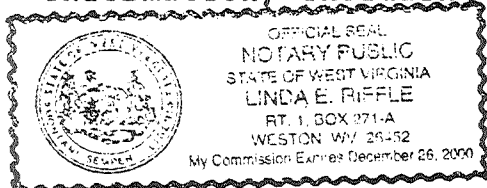
I have read and understand Chapter 22B and 38 CSR 11-18, and I agree to the terms and conditions of any permit issued under this application.

I certify under penalty of law that I have personally examined and am familiar with the information submitted on this application form and all attachments, and that based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete.

I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

Well Operator MERIDIAN EXPLORATION CORP.  
By: John Guide JOHN GUIDE  
Its: PENN CENTER WEST TWO, SUITE 325  
Address PITTSBURGH, PA 15276  
(412) 494 0604

Telephone \_\_\_\_\_  
Subscribed and sworn before me this 12<sup>th</sup> day of June, 1996



Linda E Riffle Notary Public  
My commission expires December 26, 2000



OIL AND GAS WELL PERMIT APPLICATION

WELL TYPE: Oil \_\_\_ / Gas X /  
(If "Gas", Production X / Underground storage \_\_\_ / Deep \_\_\_ / Shallow X /

LOCATION: Elevation: 1120 Watershed: South Fork of Hughes River

District: Southwest County: Doddridge Quadrangle: Oxford 7.5

WELL OPERATOR Chase Petroleum  
Address PO Box 369  
Glennville, WV 26351

DESIGNATED AGENT Alton Skinner  
Address PO Box 297  
Glennville, WV 26351

OIL & GAS ROYALTY OWNER N.H. Leggett, et al  
Address Oxford, WV 26414

COAL OPERATOR None  
Address

Acreage 93.7

COAL OWNER(S) WITH DECLARATION ON RECORD:

SURFACE OWNER N.H. Leggett  
Address Oxford, WV 26414

Name No Coal

Address

Name

Address

FIELD SALE (IF MADE) TO:  
Name Uncommitted  
Address

RECEIVED  
NOV 17 1980  
OIL & GAS DIVISION  
DEPT. OF MINES

COAL LESSEE WITH DECLARATION ON RECORD:

Name None

Address

OIL AND GAS INSPECTOR TO BE NOTIFIED:  
Name Paul Garrett

The undersigned well operator is entitled to operate for oil or gas purposes at the above location under a deed \_\_\_ / lease X / other contract \_\_\_ / dated November 14, 1980, to the undersigned well operator from N.H. Leggett, et al (if said deed, lease or other contract has been recorded:)

Recorded on \_\_\_\_, 19\_\_, in the office of the Clerk of the County Commission of \_\_\_\_, County, West Virginia, in Book \_\_\_\_, at page \_\_\_\_. A permit is requested as follows:

PROPOSED WORK: Drill X / Drill Deeper \_\_\_ / Redrill \_\_\_ / Fracture or stimulate X /  
Plug off old formation \_\_\_ / Perforate new formation \_\_\_ /  
Other physical change in well (specify) \_\_\_\_\_

--planned as shown on the work order on the reverse side hereof.

The above named coal operator, coal owner(s), and coal lessee are hereby notified that any objection they wish to make or are required to make by Code §22-4-3 must be filed with the Department of Mines within fifteen (15) days after the receipt of this Application by Department. Copies of this Permit Application and the enclosed plat and reclamation plan have been mailed registered mail or delivered by hand to the above named coal operator, coal owner(s), and coal lessees on or before the day of the mailing or delivery of this Permit Application to the Department of Mines at Charleston, West Virginia.

EASE SUBMIT COPIES OF ALL PHYSICAL LOGS DIRECTLY TO:

OFFICE OF OIL AND GAS  
15 Washington Street, East  
Charleston, West Virginia 25311

BLANKET BOND

By:

Chase Petroleum  
Well Operator

Alton Skinner

PROPOSED WORK ORDER

THIS IS AN ESTIMATE ONLY: ACTUAL INFORMATION MUST BE SUBMITTED ON FORM IV-35 UPON COMPLETION

DRILLING CONTRACTOR (IF KNOWN) S.W. Jack Drilling Company
Address Buckhannon, WV 26201

GEOLOGICAL TARGET FORMATION, Alexander

Estimated depth of completed well, 5800 feet Rotary X / Cable tools /

Approximate water strata depths: Fresh, 50 feet; salt, -- feet.

Approximate coal seam depths: No Coal Is coal being mined in the area? Yes / No X /

CASING AND TUBING PROGRAM

Table with columns: CASING OR TUBING TYPE, SPECIFICATIONS (Size, Grade, Weight, New, Used), FOOTAGE INTERVALS (For drilling, Left in well), CEMENT FILL-UP OR SACKS (Cubic feet), PACKERS (Kinds, Sizes, Depths set, Perforations: Top, Bottom)

NOTE: Regulation 7.02 of the Department of Mines provides that the original and four copies of Form IV-2 must be filed with the Department, accompanied by (i) a plat in the form prescribed by Regulation 11, (ii) a bond in one of the forms prescribed by Regulation 12, or in lieu thereof the other security allowed by Code § 22-4-2, (iii) Form IV-9, "Reclamation Plan", applicable to the reclamation required by Code § 22-4-12b and Regulation 23, (iv) unless previously paid on the same well, the fee required by Code § 22-4-12a, and (v) if applicable, the consent required by Code § 22-4-8a from the owner of any water well or dwelling within 200 feet of the proposed well.

A separate Form IV-2 shall not be required for fracturing or stimulating a well where fracturing or stimulating is to be part of the work for which a permit is sought and is noted as such on the Form IV-2 filed in connection therewith.

THIS PERMIT MUST BE POSTED AT THE WELL SITE

All provisions being in accordance with Chapter 22, of the W. Va. Code, the location is hereby approved for drilling. This permit shall expire if operations have not commenced by 7-19-81.

J. B. Huggins Deputy Director of Oil & Gas Division

The following waiver must be completed by the coal operator and by any coal owner or coal lessee who has recorded a declaration under Code § 22-4-20, if the permit is to be issued within fifteen (15) days of receipt thereof:

W A I V E R

The undersigned coal operator / owner / lessee of the coal under this well location has examined this proposed well location. If a mine map exists which covers the area of the well location, the well location has been added to the mine map. The undersigned has no objection to the work proposed to be done at this location, provided, the well operator has complied with all applicable requirements of the West Virginia Code and the governing regulations.

Date: \_\_\_\_\_, 19\_\_\_\_

By \_\_\_\_\_
Its \_\_\_\_\_