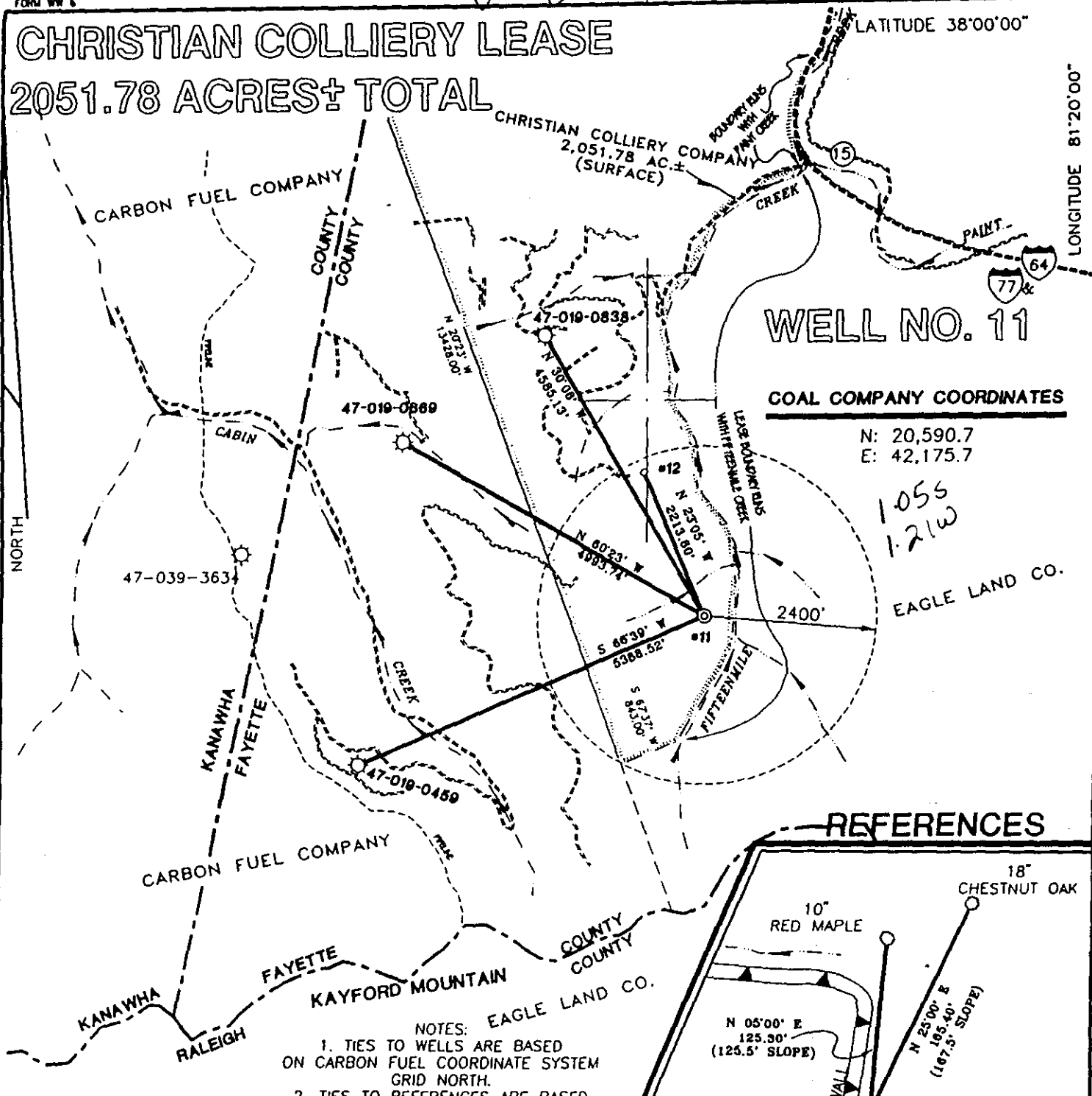


CHRISTIAN COLLIERY LEASE 2051.78 ACRES± TOTAL

LATITUDE 38°00'00"

LONGITUDE 81°20'00"

NORTH



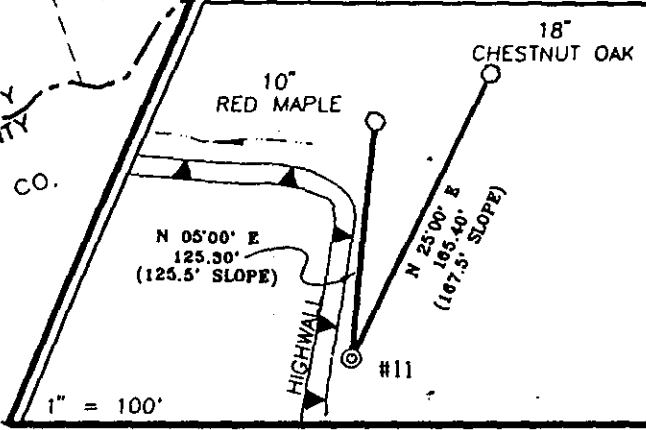
WELL NO. 11

COAL COMPANY COORDINATES

N: 20,590.7
E: 42,175.7

1055
1.21W

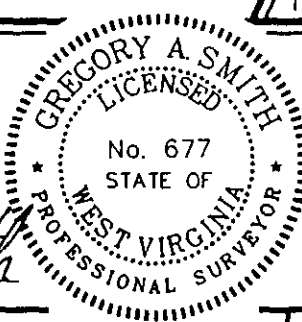
REFERENCES



- NOTES:
1. TIES TO WELLS ARE BASED ON CARBON FUEL COORDINATE SYSTEM GRID NORTH.
 2. TIES TO REFERENCES ARE BASED ON MAGNETIC NORTH 1-21-98.



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 ENERGY.




P.S. 677 *Gregory A. Smith*

(+) DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS,
 DATE FEBRUARY 11, 19 98
 OPERATORS WELL NO. CHRISTIAN COLLIERY #11
 API WELL NO. 47-19-0884
 STATE COUNTY PERMIT

MINIMUM DEGREE OF ACCURACY 1 / 2500 FILE NO. 3867P11 (63-64)
 PROVEN SOURCE OF ELEVATION CARBON FUEL CONTROL POINT #8483 ELEV. 1493.6'
 SCALE 1" = 2000'

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



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

LOCATION: ELEVATION 1915' WATERSHED FIFTEENMILE CREEK OF PAINT CREEK
 DISTRICT VALLEY COUNTY FAYETTE QUADRANGLE PAX 7.5'

SURFACE OWNER CHRISTIAN COLLIERY COMPANY ACREAGE 2051.78
 ROYALTY OWNER CHRISTIAN COLLIERY COMPANY LEASE ACREAGE 2051.78

PROPOSED WORK: LEASE NO. _____
 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 DEVONIAN SHALE
 ESTIMATED DEPTH 6000'

WELL OPERATOR BLAZER ENERGY CORPORATION DESIGNATED AGENT ROBERT ALLEY **APR 27 1998**
 ADDRESS P.O. BOX 2347 CHARLESTON, WV 25328 ADDRESS P.O. BOX 2347 CHARLESTON, WV 25328

6-6 262

COUNTY NAME
FAYETTE
PERMIT
0884

EASTERN STATES OIL & GAS, INC.
WR-35 COMPLETION REPORT - Attachment
Well Treatment Summary

Well: Christian Colliery 11

API#47-019-00884

Date	11-6-98	11-6-98	11-6-98			
Type Frac Acid, N ₂ , Foam, Water	75Q Foam	75Q Foam	75Q Foam			
Zone Treated	Gordon	L. Weir	Injun			
# Perfs	29 Holes	31 Holes	21 Holes			
From - To:	3464-3478	2974-2989	2794-2804			
BD Pressure @ psi	1235	1891	544			
ATP psi	1044	1213	1510			
Avg. Rate, B=B/M, S= SCF/M	20 B	20 B	20B			
Max. Treat Press psi	1257	1891	1784			
ISIP psi	1051	160	202			
Frac Gradient	.41	.49	.51			
10 min S-I Pressure	0	Not Reported	1390			
Material Volume						
Sand-sks	407	457	312			
Water-bbl	193	181	134			
SCF N ₂	415,000	238,000	207,000			
Acid-gal	500	500	500			
NOTES:	7 1/2%	15%	15%			

Formation Record

TOP	BOTTOM	FORMATION	Remarks
0	995	Sand & Shale	Hole Damp @ 1014
995	1525	Salt Sand	Coal Depths were not reported.
1525	1706	Sand & Shale	GT @ 2027', 2405', 2500', 2596', 2815', 2943', 3457', & 3674' - All No Show
1706	1713	Ravencliff	
1734	1763	Avis Lime	
2257	22284	Lower Maxton	
2329	2408	Little Lime	
2408	2433	Pencil Cave Shale	
2433	2751	Big Lime	
2769	2808	Big Injun	
2848	2875	Upper Weir	
2884	2896	Middle Weir	
2974	2990	Lower Weir	
3257	3290	Berea	
3459	3478	Gordon	
	3674	TD	

