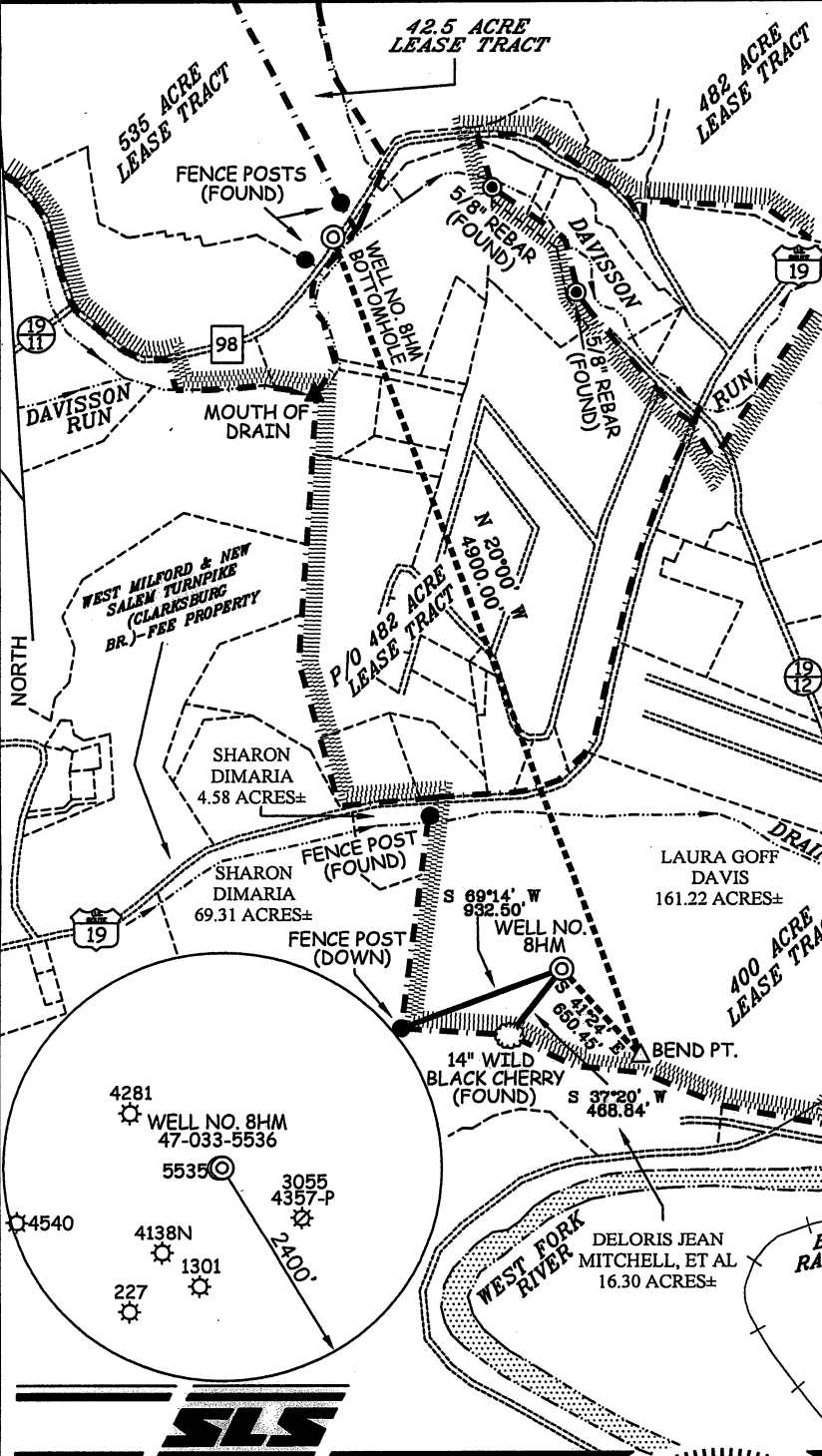


GOFF LEASE WELL NO. 8HM

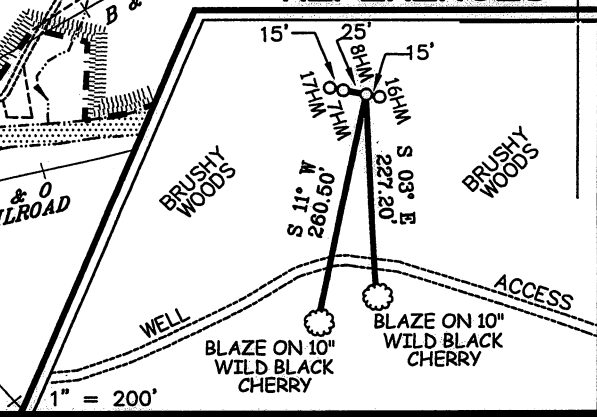


<p>WELL NO. 8HM TOP HOLE STATE PLANE COORDINATES (NORTH ZONE NAD '27)</p> <p>N. 277,607 E. 1,752,003</p> <p>TOP HOLE (NAD 27) LAT=(N) 39°15'32.0" LONG=(W) 80°22'32.9"</p> <p>TOP HOLE (NAD 83) LAT=(N) 39°15'32.3" LONG=(W) 80°22'32.3"</p> <p>TOP HOLE UTM (NAD 83) (N) 4,345,701 (E) 553,868</p>	<p>WELL NO. 8HM BEND POINT STATE PLANE COORDINATES (NORTH ZONE NAD '27)</p> <p>N. 276,925 E. 1,752,876</p> <p>BEND POINT (NAD 27) LAT=(N) 39°15'25.3" LONG=(W) 80°22'21.8"</p> <p>BEND POINT (NAD 83) LAT=(N) 39°15'25.6" LONG=(W) 80°22'21.1"</p> <p>BEND POINT UTM (NAD 83) (N) 4,345,497 (E) 554,137</p>
<p>WELL NO. 8HM BOTTOM HOLE STATE PLANE COORDINATES (NORTH ZONE NAD '27)</p> <p>N. 281,723 E. 1,750,758</p> <p>BOTTOM HOLE (NAD 27) LAT=(N) 39°16'12.5" LONG=(W) 80°22'49.3"</p> <p>BOTTOM HOLE (NAD 83) LAT=(N) 39°16'12.8" LONG=(W) 80°22'48.6"</p> <p>BOTTOM HOLE UTM (NAD 83) (N) 4,346,948 (E) 553,467</p>	

NOTES ON SURVEY

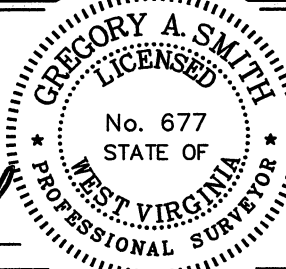
1. TIES TO WELLS AND CORNERS ARE BASED ON GRID NORTH FOR THE WV STATE PLANE COORDINATE SYSTEM NORTH ZONE NAD '27.
2. TIES TO REFERENCES ARE BASED ON MAGNETIC NORTH 03-08-10.
3. LEASE BOUNDARY SHOWN HEREON TAKEN FROM DEED BOOK 70 PAGE 152 AND ADJOINING DEEDS.
4. SURFACE OWNER AND ADJOINER INFORMATION TAKEN FROM THE ASSESSOR AND COUNTY CLERK RECORDS OF HARRISON COUNTY IN JULY, 2012.
5. WELL LAT./LONG. (NAD'27) ESTABLISHED BY DGPS (SUBMETER MAPPING GRADE).

REFERENCES



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 DIVISION OF ENVIRONMENTAL PROTECTION.

Gregory A. Smith



(+) DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS.
 DATE OCTOBER 8 , 20 12
 REVISED JANUARY 8 , 20 13
 OPERATORS WELL NO. GOFF #8HM
 API WELL NO. 47 - 033 - 5536H
 STATE COUNTY PERMIT

MINIMUM DEGREE OF ACCURACY 1/200 FILE NO. 7129P8HMR3 (297-57)
 PROVEN SOURCE OF ELEVATION DGPS (SUBMETER MAPPING GRADE) SCALE 1" = 1,000'

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 1,158' WATERSHED WEST FORK RIVER
 DISTRICT CLARK COUNTY HARRISON QUADRANGLE WOLF SUMMIT 7.5'

SURFACE OWNER LAURA GOFF DAVIS ACREAGE 161.22±
 ROYALTY OWNER GOFF HEIRS, ET AL & STATE OF WV LEASE ACREAGE 400, 42.5, 535, & 482 OF 1087± TOTAL

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 MARCELLUS
 ESTIMATED DEPTH 6,920'

WELL OPERATOR PDC MOUNTAINEER, LLC DESIGNATED AGENT JAMIE HAGA
 ADDRESS 120 GENESIS BOULEVARD BRIDGEPORT, WV 26330 ADDRESS 120 GENESIS BOULEVARD BRIDGEPORT, WV 26330