

**FITZGERALD S LEASE  
WELL 4HM  
TUG HILL OPERATING**

TAG	SURFACE OWNER	PARCEL	ACRES
A	DANNY R. & FRANCES V. KERNS ESTATE	7-8-1	27.00
B	DANNY R. & FRANCES V. KERNS ESTATE	9-9-14	48.308
C	TODD L. SCHERICH, ET AL	9-9-16	168.204
D	CHARLES WILLIAM DOBBS, ET AL	9-12-9	82.18
E	MARK D. & SHERYL CHAMBERS	9-12-11	91.00
F	DAVID L. WHIPKEY & DAVID MATTHEW WHIPKEY	9-12-12	61.00
G	DAVID & CAROL WHIPKEY TRUST, ET AL	9-12-16	30.00
H	DAVID & CAROL WHIPKEY TRUST, ET AL	9-12-17	37.27
I	CONSOL MINING CO., LLC	7-8-7	31.99
J	CONSOL MINING CO., LLC	7-9-22	101.36

T.H. LATITUDE 39°50'00"  
B.H. LATITUDE 39°47'30"

(S.P.C. NORTH ZONE) (UTM(M) ZONE 17 NORTH)

NAD'83 S.P.C.(FT)	N. 475,990.09	E. 1,647,843.68
NAD'83 GEO.	LAT-(N) 39.801242	LONG-(W) 80.641326
NAD'83 UTM (M)	N. 4,405,758.93	E. 530,704.93
<b>LANDING POINT</b>		
NAD'83 S.P.C.(FT)	N. 476,205.1	E. 1,644,092.4
NAD'83 GEO.	LAT-(N) 39.801701	LONG-(W) 80.654686
NAD'83 UTM (M)	N. 4,405,805.3	E. 529,561.0
<b>BOTTOM HOLE</b>		
NAD'83 S.P.C.(FT)	N. 458,914.4	E. 1,648,177.3
NAD'83 GEO.	LAT-(N) 39.781830	LONG-(W) 80.639819
NAD'83 UTM (M)	N. 4,403,605.0	E. 530,842.6

T.H. LONGITUDE 80°37'30"  
B.H. LONGITUDE 80°37'30"  
3,584' B.H.  
11,680' T.H.

**NOTES ON SURVEY**

- NO WATER WELLS WERE FOUND WITHIN 250' OF PROPOSED GAS WELL. NO AGRICULTURAL BUILDINGS OR DWELLINGS ≥ 2500 SQ. FT. WERE FOUND WITHIN 625' OF THE CENTER OF PROPOSED WELL PAD.
- WELL SPOT CIRCLE & TOPO MARK SCALE IS 1"=2000'.



12 Vanhorn Drive | P.O. Box 150 | Glenville, WV 26351 | 304.462.5634  
1413 Kanawha Boulevard, East | Charleston, WV 25301 | 304.346.3952  
254 East Beckley Bypass | Beckley, WV 25801 | 304.255.5295  
slswv.com

**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.



P.S. 677 *Gregory A. Smith*

(+) DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS.  
DATE FEBRUARY 20, 20 20  
REVISED MAY 19, 2021, JULY 15, 2021  
OPERATORS WELL NO. FITZGERALD S 4HM  
API WELL NO. 47 - 051 - 02394 HGA  
STATE COUNTY PERMIT

MINIMUM DEGREE OF ACCURACY 1/2500 FILE NO. 8910P4HMR2.dwg  
FITZGERALD S 4HM REV5  
HORIZONTAL & VERTICAL CONTROL DETERMINED BY DGPS (SURVEY GRADE TIE TO CORS NETWORK) 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 1,293.00' WATERSHED SPEAKEASY HOLLOW OF MAGGOTY RUN  
DISTRICT LIBERTY COUNTY MARSHALL QUADRANGLE GLEN EASTON 7.5'

SURFACE OWNER DANNY AND FRANCES KERNS ESTATE ACREAGE 27.00±  
ROYALTY OWNER DANNY S. KERNS, ET AL ACREAGE 27.00±

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 MARCELLUS  
ESTIMATED DEPTH TVD: 7,025' / TMD: 17,152'

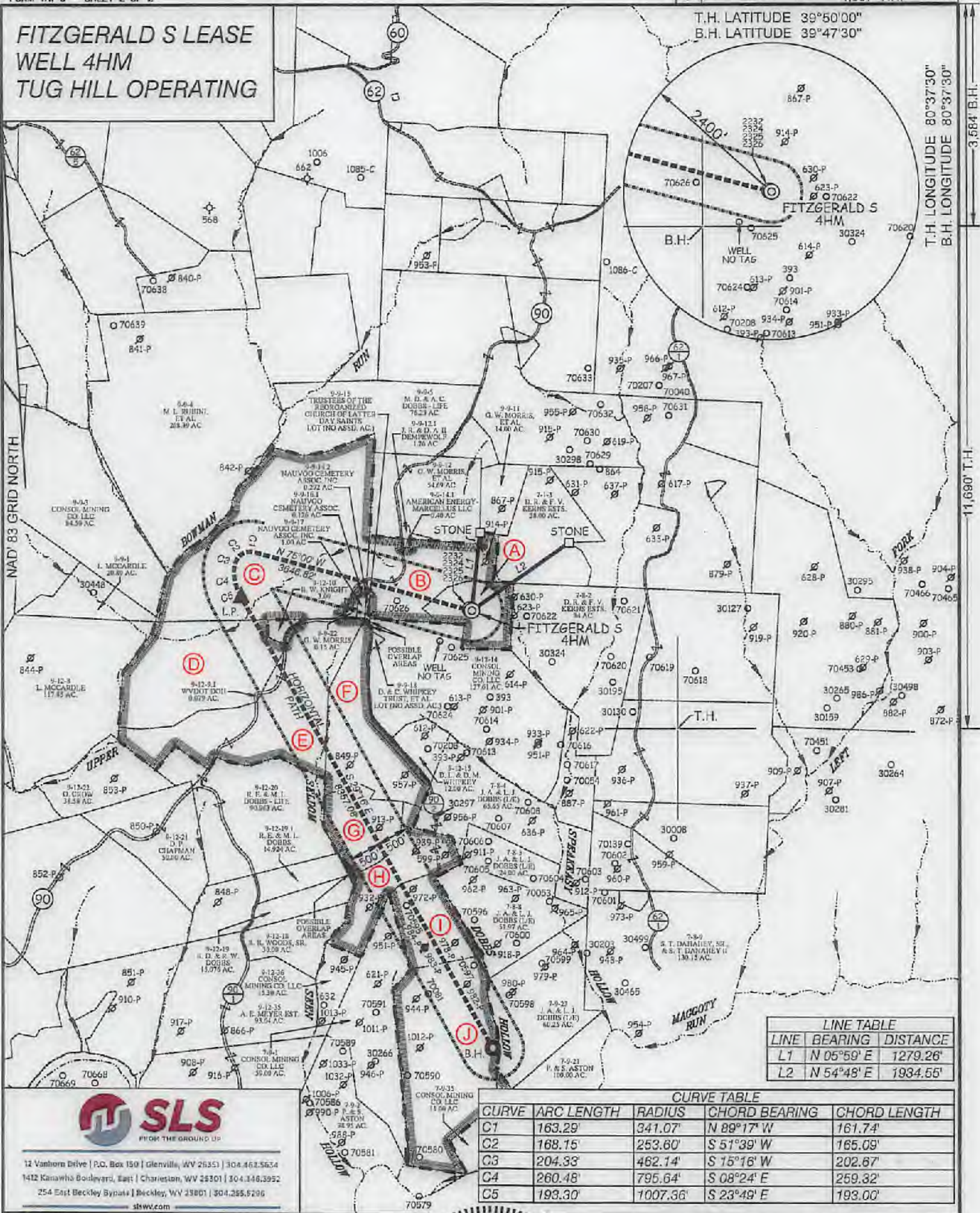
WELL OPERATOR TUG HILL OPERATING, LLC DESIGNATED AGENT DARREN BROWN  
ADDRESS 1320 SOUTH UNIVERSITY DRIVE, SUITE 500 ADDRESS 5098 WASHINGTON ST. W, STE 407  
FORT WORTH, TX 76107 CHARLESTON, WV 25313-1561

COUNTY NAME PERMIT

**FITZGERALD S LEASE  
WELL 4HM  
TUG HILL OPERATING**

T.H. LATITUDE 39°50'00"  
B.H. LATITUDE 39°47'30"

T.H. LONGITUDE 80°37'30"  
B.H. LONGITUDE 80°37'30"



LINE TABLE		
LINE	BEARING	DISTANCE
L1	N 05°59' E	1279.26'
L2	N 54°48' E	1934.55'

CURVE TABLE				
CURVE	ARC LENGTH	RADIUS	CHORD BEARING	CHORD LENGTH
C1	163.29'	341.07'	N 89°17' W	161.74'
C2	168.15'	253.60'	S 51°39' W	165.09'
C3	204.33'	462.14'	S 15°16' W	202.67'
C4	260.48'	795.64'	S 08°24' E	259.32'
C5	193.30'	1007.36'	S 23°48' E	193.00'



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(S.P.C. NORTH ZONE) (UTM(M) ZONE 17 NORTH)

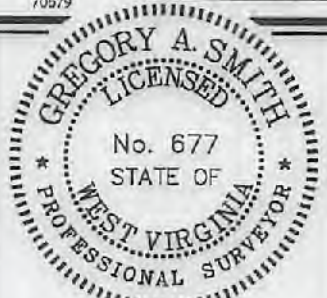
NAD'83 S.P.C. (FT)	N. 475,990.09	E. 1,647,843.08
NAD'83 GEO.	LAT-(N) 39.801242	LONG-(W) 80.641326
NAD'83 UTM (M)	N. 4,405,768.03	E. 530,704.93

**LANDING POINT**

NAD'83 S.P.C. (FT)	N. 476,205.1	E. 1,844,092.4
NAD'83 GEO.	LAT-(N) 39.801701	LONG-(W) 80.654686
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**BOTTOM HOLE**

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(+) DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS.

P.S. 677 *Gregory A. Smith*

SCALE 1" = 2000' FILE NO. 8910P4HMR2.dwg  
 FITZGERALD S 4HM REV5  
 DATE FEBRUARY 20, 2020  
 REVISED MAY 19, 2021, JULY 15, 2021  
 OPERATORS WELL NO. FITZGERALD S 4HM  
 API WELL NO. 47-051-02394 H6A  
 NO. STATE COUNTY PERMIT

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

**LEGEND**

LEASE LINE	
SURFACE LINE	
WELL LATERAL	
OFFSET LINE	
TIE LINE	
CREEK	
ROAD	
COUNTY ROUTE	
PROPOSED WELL	
EXISTING WELL	
PERMITTED WELL	
TAX MAP-PARCEL	
SURFACE OWNER (SEE TABLE)	
LEASE # (SEE WW-6A1)	

WELL OPERATOR	TUG HILL OPERATING, LLC	DESIGNATED AGENT	DARREN BROWN
ADDRESS	1320 SOUTH UNIVERSITY DRIVE, SUITE 500 FORT WORTH, TX 76107	ADDRESS	5098 WASHINGTON ST. W, STE 407 CHARLESTON, WV 25313-1561

COUNTY NAME  
PERMIT