

Location: Brooke County, WV  
Field: Brooke  
Facility: Brian Teslovich BRK Pad

Slot: Slot 1H  
Well: Brian Teslovich BRK 1H  
Wellbore: Brian Teslovich BRK 1H PWB

Plot reference wellpath is Brian Teslovich BRK 1H AWB_awp 100' - 22139' Proj: 22164'	Grid System: NAD83 / UTM Zone 17 North, US feet
True vertical depths are referenced to SDC 40 (KB)	North Reference: Grid north
Reference wellpath measured depths are referenced to SDC 40 (KB)	Scale: True distance
SDC 40 (KB) to Mean Sea Level: 1176.5 feet	Coordinates are in feet referenced to Slot
Mean Sea Level to Ground level (At Slot: Slot 1H): -1149.5 feet	Depths are in feet
Offset wellpath MDs are referenced to each path's default MD datum	Created by: tranlam on 2021-11-30; Database: WA_MPL_EASTERNUS_Defn

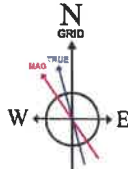
### Bottom Hole Location

MD (ft)	Inc (°)	Az (°)	TVD (ft)	Local N (ft)	Local E (ft)	Grid East (US ft)	Grid North (US ft)	Latitude	Longitude
22164.00	90.550	336.130	5636.37	10958.17	-4866.73	1737888.47	14616805.75	40°14'48.5643"N	80°39'2.4809"W

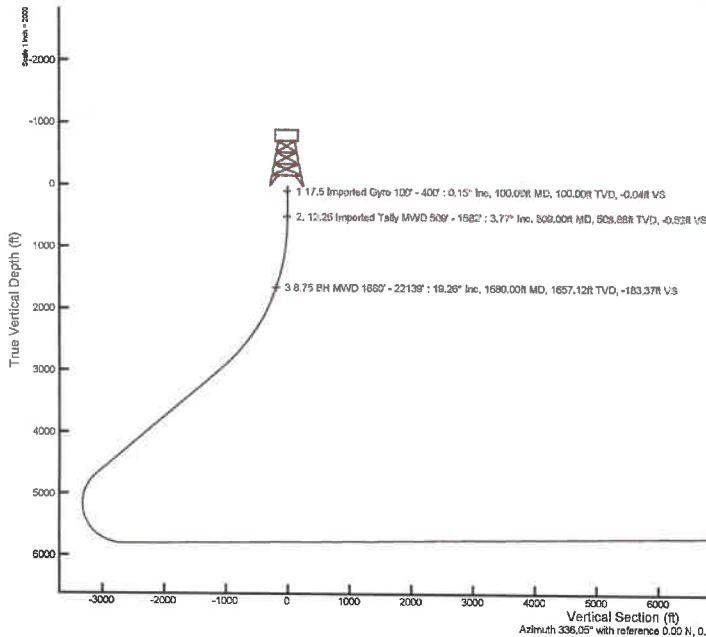
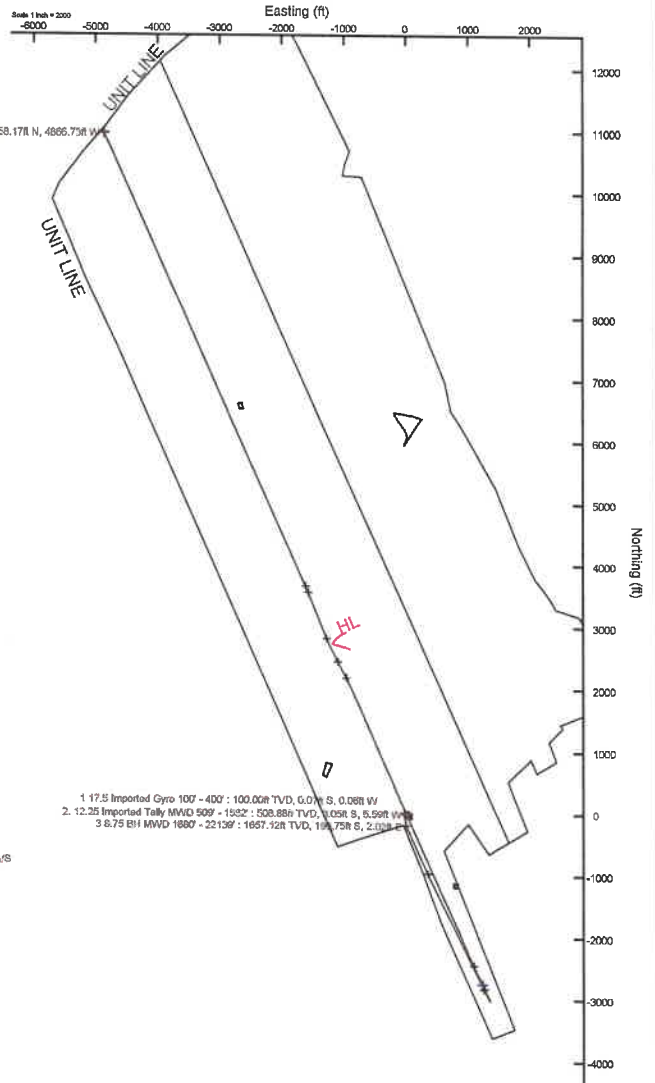
### Location Information

Facility Name	Grid East (US ft)	Grid North (US ft)	Latitude	Longitude
Brian Teslovich BRK Pad	1742783.570	14605561.350	40°14'48.5643"N	80°39'2.4809"W
Slot 1H	1742783.500	14605561.400	40°14'48.5643"N	80°39'2.4809"W
SDC 40 (KB) to Ground level (At Slot: Slot 1H)				
Mean Sea Level to Ground level (At Slot: Slot 1H)				
SDC 40 (KB) to Mean Sea Level				

**API: 47009003250000**  
**Rig: SDC 40**  
**Duration: 11-19-2021 to 11-25-2021**  
**BH Job# 111048058**



HDG2021v11.0 (1900.0 to 2022.0) Dip: 67.26° Field: 52167.5 nT  
Magnetic North is 8.21 degrees West of True North (at 11/15/2021)  
Grid North is 0.24 degrees East of True North  
To correct azimuth from True to Grid subtract 0.24 degrees  
To correct azimuth from Magnetic to Grid subtract 8.45 degrees



1 17.5 Imported Gyro 100' - 400' : 0.15" Inc, 100.00R MD, 100.00R TVD, -0.04R VS  
2 12.25 Imported Tally MWD 509' - 1882' : 3.77" Inc, 508.88R MD, 508.88R TVD, -0.52R VS  
3 8.75 BH MWD 1880' - 22139' : 18.28" Inc, 1690.00R MD, 1657.12R TVD, -183.37R VS

Projection to TD: 22164' : 90.55° Inc, 22164.00R MD, 5636.37R TVD, 11900.27R VS

**REFERENCE WELLPATH IDENTIFICATION**

Operator	SWN PRODUCTION COMPANY, LLC	Well	Brian Teslovich BRK 1H
Field	Brooke	API	4700900325
Facility	Brian Teslovich BRK Pad	Wellbore	Brian Teslovich BRK 1H AWB
Slot	Slot 1H		

**REPORT SETUP INFORMATION**

Projection System	NAD83 / UTM Zone 17 North, US feet	Software System	WellArchitect® 6.0
North Reference	Grid	User	Tranlam
Scale	0.999612	Report Generated	11/30/2021 at 1:40:48 PM
Convergence at slot	0.24° East	Database	WA_MPL_EASTERNUS_Defn

**WELLPATH LOCATION**

	Local coordinates		Grid coordinates		Geographic coordinates	
	North[ft]	East[ft]	Easting[US ft]	Northing[US ft]	Latitude	Longitude
Slot Location	0.49	-0.37	1742753.30	14605851.85	40°13'0.0833"N	80°38'0.3032"W
Facility Reference Pt			1742753.67	14605851.36	40°13'0.0784"N	80°38'0.2985"W
Field Reference Pt			0.00	0.00	0°00'0.0000"	85°29'19.4780"W

**WELLPATH DATUM**

Calculation method	Minimum curvature	SDC 40 (KB) to Facility Vertical Datum	1175.50ft
Horizontal Reference Pt	Slot	SDC 40 (KB) to Mean Sea Level	1175.50ft
Vertical Reference Pt	SDC 40 (KB)	SDC 40 (KB) to Ground Level at Slot (Slot 1H)	26.00ft
MD Reference Pt	SDC 40 (KB)	Section Origin	N 0.00, E 0.00 ft
Field Vertical Reference	Mean Sea Level	Section Azimuth	336.05°

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Field	Brooke	API	4700900325
Facility	Brian Teslovich BRK Pad	Wellbore	Brian Teslovich BRK 1H AWB
Slot	Slot 1H		

WELLPATH DATA (250 stations) † = interpolated, ‡ = extrapolated station													
MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	Grid East [US ft]	Grid North [US ft]	Latitude	Longitude	Closure Dist [ft]	Closure Dir [°]	DLS [°/100ft]
0.00†	0.000	221.480	0.00	0.00	0.00	0.00	1742753.30	14605851.85	40°13'0.0833"N	80°38'0.3032"W	0.00	0.000	0.00
26.00	0.000	221.480	26.00	0.00	0.00	0.00	1742753.30	14605851.85	40°13'0.0833"N	80°38'0.3032"W	0.00	0.000	0.00
100.00	0.150	221.480	100.00	-0.04	-0.07	-0.06	1742753.24	14605851.78	40°13'0.0826"N	80°38'0.3041"W	0.10	221.480	0.20
150.00	0.240	193.560	150.00	-0.15	-0.22	-0.13	1742753.17	14605851.63	40°13'0.0811"N	80°38'0.3049"W	0.26	210.589	0.26
200.00	0.090	283.880	200.00	-0.21	-0.32	-0.19	1742753.11	14605851.53	40°13'0.0802"N	80°38'0.3057"W	0.37	211.662	0.51
250.00	0.220	230.600	250.00	-0.21	-0.37	-0.31	1742752.99	14605851.48	40°13'0.0797"N	80°38'0.3072"W	0.48	219.894	0.36
300.00	0.330	244.720	300.00	-0.24	-0.49	-0.51	1742752.79	14605851.36	40°13'0.0785"N	80°38'0.3098"W	0.71	226.242	0.26
350.00	0.370	266.320	350.00	-0.19	-0.56	-0.80	1742752.50	14605851.29	40°13'0.0778"N	80°38'0.3136"W	0.98	235.024	0.27
400.00	1.210	247.840	399.99	-0.11	-0.77	-1.45	1742751.85	14605851.08	40°13'0.0757"N	80°38'0.3220"W	1.64	242.043	1.73
509.00	3.770	239.060	508.88	-0.52	-3.05	-5.59	1742747.71	14605848.80	40°13'0.0534"N	80°38'0.3755"W	6.37	241.411	2.37
600.00	5.660	242.510	599.57	-1.16	-6.66	-12.14	1742741.16	14605845.19	40°13'0.0180"N	80°38'0.4601"W	13.85	241.259	2.10
691.00	6.160	227.870	690.09	-2.96	-12.00	-19.74	1742733.57	14605839.85	40°12'59.9654"N	80°38'0.5583"W	23.11	238.698	1.74
781.00	6.930	210.990	779.51	-7.58	-19.90	-26.12	1742727.19	14605831.96	40°12'59.8877"N	80°38'0.6410"W	32.84	232.698	2.29
872.00	7.980	196.520	869.75	-15.54	-30.66	-30.74	1742722.57	14605821.20	40°12'59.7815"N	80°38'0.7011"W	43.42	225.075	2.35
963.00	7.990	180.820	959.88	-26.09	-43.04	-32.63	1742720.68	14605808.82	40°12'59.6592"N	80°38'0.7261"W	54.01	217.164	2.39
1053.00	8.240	167.270	1048.98	-38.10	-55.59	-31.30	1742722.01	14605796.28	40°12'59.5352"N	80°38'0.7096"W	63.80	209.380	2.14
1144.00	9.780	159.060	1138.86	-52.21	-69.17	-27.10	1742726.21	14605782.71	40°12'59.4008"N	80°38'0.6562"W	74.29	201.393	2.20
1235.00	10.920	162.990	1228.38	-68.49	-84.63	-21.81	1742731.49	14605767.25	40°12'59.2478"N	80°38'0.5889"W	87.40	194.454	1.47
1325.00	12.820	172.490	1316.46	-86.53	-102.69	-18.02	1742735.29	14605749.20	40°12'59.0693"N	80°38'0.5409"W	104.26	189.951	3.02
1416.00	15.770	174.230	1404.63	-107.97	-125.00	-15.45	1742737.85	14605726.89	40°12'58.8486"N	80°38'0.5091"W	125.96	187.047	3.28
1508.00	16.170	169.580	1493.09	-132.30	-150.04	-11.88	1742741.43	14605701.87	40°12'58.6010"N	80°38'0.4643"W	150.51	184.526	1.46
1582.00	17.070	165.460	1564.00	-153.04	-170.69	-7.29	1742746.02	14605681.22	40°12'58.3968"N	80°38'0.4062"W	170.85	182.445	2.00
1680.00	19.260	159.390	1657.12	-183.37	-199.75	2.02	1742755.31	14605652.18	40°12'58.1093"N	80°38'0.2879"W	199.76	179.422	2.95
1722.00	19.070	155.810	1696.79	-197.15	-212.49	7.27	1742760.56	14605639.44	40°12'57.9832"N	80°38'0.2209"W	212.62	178.042	2.83
1815.00	21.100	155.880	1784.13	-229.08	-241.63	20.33	1742773.62	14605610.31	40°12'57.6947"N	80°38'0.0540"W	242.49	175.190	2.18
1905.00	22.480	155.640	1867.70	-262.49	-272.09	34.05	1742787.34	14605579.86	40°12'57.3931"N	80°37'59.8788"W	274.22	172.867	1.54
1996.00	24.090	155.450	1951.28	-298.46	-304.84	48.94	1742802.22	14605547.13	40°12'57.0689"N	80°37'59.6886"W	308.74	170.879	1.77
2087.00	26.300	155.880	2033.62	-337.19	-340.13	64.90	1742818.17	14605511.85	40°12'56.7195"N	80°37'59.4848"W	346.27	169.197	2.44
2178.00	28.380	155.830	2114.45	-378.98	-378.27	82.00	1742835.26	14605473.73	40°12'56.3419"N	80°37'59.2664"W	387.05	167.769	2.29
2270.00	29.910	155.410	2194.80	-423.79	-419.08	100.49	1742853.75	14605432.94	40°12'55.9379"N	80°37'59.0302"W	430.96	166.515	1.68



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Field	Brooke	API	4700900325
Facility	Brian Teslovich BRK Pad	Wellbore	Brian Teslovich BRK 1H AWB
Slot	Slot 1H		

**WELLPATH DATA (250 stations)**

MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	Grid East [US ft]	Grid North [US ft]	Latitude	Longitude	Closure Dist [ft]	Closure Dir [°]	DLS [°/100ft]
2363.00	32.050	155.930	2274.53	-471.65	-462.69	120.21	1742873.46	14605389.34	40°12'55.5061"N	80°37'58.7784"W	478.06	165.436	2.32
2453.00	33.900	156.240	2350.03	-520.64	-507.47	140.06	1742893.31	14605344.57	40°12'55.0628"N	80°37'58.5248"W	526.45	164.571	2.06
2544.00	35.470	156.230	2424.85	-572.42	-554.87	160.93	1742914.17	14605297.20	40°12'54.5936"N	80°37'58.2584"W	577.73	163.826	1.73
2636.00	37.380	156.050	2498.88	-627.04	-604.82	183.03	1742936.26	14605247.27	40°12'54.0990"N	80°37'57.9762"W	631.91	163.163	2.08
2726.00	38.790	155.780	2569.71	-682.56	-655.50	205.68	1742958.90	14605196.61	40°12'53.5973"N	80°37'57.6869"W	687.01	162.579	1.58
2817.00	40.760	155.890	2639.65	-740.77	-708.62	229.51	1742982.73	14605143.51	40°12'53.0714"N	80°37'57.3825"W	744.86	162.053	2.17
2909.00	41.750	155.970	2708.81	-801.44	-764.01	254.26	1743007.46	14605088.14	40°12'52.5231"N	80°37'57.0665"W	805.20	161.593	1.08
2999.00	43.720	156.100	2774.91	-862.51	-819.81	279.06	1743032.25	14605032.36	40°12'51.9706"N	80°37'56.7498"W	866.01	161.202	2.19
3090.00	45.740	156.240	2839.56	-926.55	-878.39	304.93	1743058.11	14604973.80	40°12'51.3906"N	80°37'56.4194"W	929.82	160.856	2.22
3180.00	47.840	156.110	2901.18	-992.14	-938.40	331.43	1743084.60	14604913.82	40°12'50.7966"N	80°37'56.0811"W	995.21	160.547	2.34
3272.00	48.930	156.130	2962.28	-1060.92	-1001.29	359.27	1743112.43	14604850.95	40°12'50.1740"N	80°37'55.7255"W	1063.79	160.261	1.18
3364.00	48.800	153.910	3022.80	-1130.19	-1064.09	388.53	1743141.68	14604788.17	40°12'49.5522"N	80°37'55.3518"W	1132.81	159.941	1.82
3455.00	48.800	154.190	3082.74	-1198.62	-1125.66	418.49	1743171.63	14604726.63	40°12'48.9426"N	80°37'54.9689"W	1200.93	159.606	0.23
3546.00	48.880	153.760	3142.63	-1267.09	-1187.22	448.55	1743201.68	14604665.09	40°12'48.3329"N	80°37'54.5847"W	1269.13	159.303	0.37
3637.00	50.380	154.050	3201.58	-1336.37	-1249.48	479.05	1743232.16	14604602.85	40°12'47.7164"N	80°37'54.1950"W	1338.17	159.023	1.67
3728.00	50.390	153.950	3259.60	-1406.42	-1312.49	509.78	1743262.88	14604539.87	40°12'47.0925"N	80°37'53.8022"W	1408.02	158.774	0.09
3819.00	50.400	153.810	3317.61	-1476.49	-1375.44	540.64	1743293.73	14604476.94	40°12'46.4692"N	80°37'53.4078"W	1477.88	158.542	0.12
3909.00	50.440	154.170	3374.96	-1545.81	-1437.78	571.06	1743324.14	14604414.63	40°12'45.8519"N	80°37'53.0190"W	1547.04	158.338	0.31
4001.00	50.470	153.600	3433.53	-1616.70	-1501.48	602.29	1743355.36	14604350.95	40°12'45.2211"N	80°37'52.6199"W	1617.78	158.143	0.48
4092.00	50.350	153.470	3491.52	-1686.76	-1564.26	633.54	1743386.59	14604288.20	40°12'44.5995"N	80°37'52.2204"W	1687.69	157.952	0.17
4183.00	50.410	154.090	3549.55	-1756.80	-1627.15	664.51	1743417.55	14604225.34	40°12'43.9768"N	80°37'51.8246"W	1757.61	157.785	0.53
4276.00	49.940	154.000	3609.12	-1828.18	-1691.37	695.77	1743448.80	14604161.14	40°12'43.3409"N	80°37'51.4251"W	1828.88	157.639	0.51
4366.00	49.830	153.790	3667.10	-1896.96	-1753.17	726.06	1743479.07	14604099.36	40°12'42.7289"N	80°37'51.0381"W	1897.57	157.504	0.22
4457.00	49.790	154.010	3725.83	-1966.43	-1815.60	756.64	1743509.64	14604036.96	40°12'42.1108"N	80°37'50.6473"W	1966.95	157.376	0.19
4549.00	49.870	154.020	3785.17	-2036.68	-1878.79	787.44	1743540.43	14603973.79	40°12'41.4850"N	80°37'50.2536"W	2037.14	157.260	0.09
4640.00	49.880	154.050	3843.82	-2106.22	-1941.35	817.90	1743570.89	14603911.26	40°12'40.8656"N	80°37'49.8643"W	2106.61	157.154	0.03
4731.00	49.860	153.610	3902.47	-2175.75	-2003.80	848.59	1743601.56	14603848.84	40°12'40.2472"N	80°37'49.4722"W	2176.08	157.048	0.37
4822.00	49.860	154.010	3961.14	-2245.26	-2066.22	879.29	1743632.25	14603786.44	40°12'39.6291"N	80°37'49.0798"W	2245.53	156.947	0.34
4912.00	49.870	154.020	4019.15	-2314.02	-2128.07	909.44	1743662.39	14603724.61	40°12'39.0167"N	80°37'48.6945"W	2314.25	156.860	0.01
5003.00	49.870	154.210	4077.80	-2383.56	-2190.67	939.82	1743692.75	14603662.04	40°12'38.3968"N	80°37'48.3064"W	2383.75	156.780	0.16





# Actual Wellpath Report

Brian Teslovich BRK 1H AWB\_awp 100' - 22139' Proj: 22164'  
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REFERENCE WELLPATH IDENTIFICATION			
Operator	SWN PRODUCTION COMPANY, LLC	Well	Brian Teslovich BRK 1H
Field	Brooke	API	4700900325
Facility	Brian Teslovich BRK Pad	Wellbore	Brian Teslovich BRK 1H AWB
Slot	Slot 1H		

WELLPATH DATA (250 stations)													
MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	Grid East [US ft]	Grid North [US ft]	Latitude	Longitude	Closure Dist [ft]	Closure Dir [°]	DLS [°/100ft]
5094.00	49.930	153.910	4136.42	-2453.13	-2253.26	970.26	1743723.19	14603599.47	40°12'37.7770"N	80°37'47.9173"W	2453.29	156.703	0.26
5186.00	49.810	153.750	4195.71	-2523.42	-2316.39	1001.29	1743754.20	14603536.36	40°12'37.1519"N	80°37'47.5208"W	2523.54	156.623	0.19
5278.00	49.900	154.090	4255.03	-2593.69	-2379.56	1032.20	1743785.10	14603473.22	40°12'36.5264"N	80°37'47.1257"W	2593.79	156.550	0.30
5368.00	49.900	154.170	4313.00	-2662.50	-2441.50	1062.24	1743815.13	14603411.30	40°12'35.9131"N	80°37'46.7419"W	2662.57	156.487	0.07
5459.00	49.950	153.450	4371.58	-2732.08	-2503.99	1092.98	1743845.85	14603348.84	40°12'35.2943"N	80°37'46.3491"W	2732.13	156.419	0.61
5550.00	49.780	154.040	4430.24	-2801.59	-2566.38	1123.75	1743876.61	14603286.47	40°12'34.6765"N	80°37'45.9558"W	2801.63	156.353	0.53
5639.00	49.980	153.940	4487.59	-2869.61	-2627.55	1153.60	1743906.45	14603225.33	40°12'34.0708"N	80°37'45.5744"W	2869.63	156.297	0.24
5730.00	50.020	153.420	4546.09	-2939.26	-2690.03	1184.51	1743937.34	14603162.87	40°12'33.4521"N	80°37'45.1794"W	2939.27	156.235	0.44
5820.00	49.950	153.320	4603.96	-3008.11	-2751.65	1215.40	1743968.23	14603101.28	40°12'32.8420"N	80°37'44.7845"W	3008.12	156.169	0.12
5911.00	50.030	155.260	4662.46	-3077.77	-2814.44	1245.63	1743998.45	14603038.51	40°12'32.2202"N	80°37'44.3982"W	3077.77	156.126	1.64
6002.00	43.050	154.520	4725.02	-3143.77	-2874.22	1273.62	1744026.43	14602978.75	40°12'31.6283"N	80°37'44.0407"W	3143.77	156.101	7.69
6093.00	35.690	154.060	4795.32	-3201.42	-2926.20	1298.63	1744051.43	14602926.79	40°12'31.1136"N	80°37'43.7212"W	3201.42	156.069	8.09
6186.00	27.100	153.980	4874.63	-3249.80	-2969.72	1319.83	1744072.62	14602883.29	40°12'30.6827"N	80°37'43.4503"W	3249.80	156.038	9.24
6276.00	19.160	154.350	4957.33	-3285.10	-3001.50	1335.24	1744088.02	14602851.52	40°12'30.3679"N	80°37'43.2534"W	3285.10	156.018	8.82
6369.00	10.220	150.770	5047.20	-3308.62	-3022.50	1345.90	1744098.67	14602830.52	40°12'30.1600"N	80°37'43.1171"W	3308.62	155.997	9.66
6460.00	3.610	134.850	5137.50	-3319.34	-3031.58	1351.88	1744104.65	14602821.45	40°12'30.0700"N	80°37'43.0405"W	3319.35	155.966	7.49
6551.00	6.580	343.890	5228.33	-3316.84	-3028.58	1352.47	1744105.24	14602824.45	40°12'30.0996"N	80°37'43.0328"W	3316.85	155.936	10.87
6643.00	14.890	342.000	5318.64	-3299.83	-3012.25	1347.34	1744100.12	14602840.78	40°12'30.2613"N	80°37'43.0980"W	3299.84	155.902	9.04
6735.00	22.320	338.780	5405.78	-3270.59	-2984.68	1337.35	1744090.13	14602868.33	40°12'30.5341"N	80°37'43.2253"W	3270.60	155.864	8.15
6825.00	29.530	334.440	5486.67	-3231.29	-2948.69	1321.57	1744074.36	14602904.31	40°12'30.8904"N	80°37'43.4267"W	3231.31	155.859	8.28
6916.00	37.830	331.930	5562.34	-3180.95	-2903.76	1298.73	1744051.52	14602949.23	40°12'31.3354"N	80°37'43.7187"W	3180.96	155.903	9.25
7009.00	47.370	332.510	5630.71	-3118.21	-2848.11	1269.45	1744022.25	14603004.85	40°12'31.8864"N	80°37'44.0931"W	3118.21	155.977	10.27
7099.00	55.840	336.230	5686.57	-3047.78	-2784.54	1239.09	1743991.91	14603068.40	40°12'32.5160"N	80°37'44.4809"W	3047.78	156.011	9.95
7190.00	63.720	336.600	5732.34	-2969.21	-2712.52	1207.66	1743960.49	14603140.38	40°12'33.2289"N	80°37'44.8821"W	2969.22	156.001	8.67
7280.00	70.610	334.280	5767.25	-2886.33	-2637.15	1173.17	1743926.02	14603215.73	40°12'33.9751"N	80°37'45.3226"W	2886.33	156.017	8.02
7372.00	78.590	334.940	5791.66	-2797.73	-2557.08	1135.18	1743888.04	14603295.76	40°12'34.7679"N	80°37'45.8080"W	2797.73	156.062	8.70
7463.00	86.030	335.120	5803.83	-2707.63	-2475.39	1097.14	1743850.01	14603377.43	40°12'35.5768"N	80°37'46.2939"W	2707.63	156.096	8.18
7554.00	90.430	335.990	5806.64	-2616.70	-2392.61	1059.51	1743812.40	14603460.18	40°12'36.3964"N	80°37'46.7744"W	2616.70	156.115	4.93
7645.00	90.650	335.940	5805.78	-2525.70	-2309.50	1022.45	1743775.35	14603543.25	40°12'37.2191"N	80°37'47.2477"W	2525.71	156.120	0.25
7736.00	90.620	336.700	5804.77	-2434.71	-2226.17	985.90	1743738.82	14603626.55	40°12'38.0441"N	80°37'47.7142"W	2434.71	156.113	0.84



**REFERENCE WELLPATH IDENTIFICATION**

Operator	SWN PRODUCTION COMPANY, LLC	Well	Brian Teslovich BRK 1H
Field	Brooke	API	4700900325
Facility	Brian Teslovich BRK Pad	Wellbore	Brian Teslovich BRK 1H AWB
Slot	Slot 1H		

**WELLPATH DATA (250 stations)**

MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	Grid East [US ft]	Grid North [US ft]	Latitude	Longitude	Closure Dist [ft]	Closure Dir [°]	DLS [°/100ft]
7827.00	90.950	337.360	5803.53	-2343.73	-2142.39	950.39	1743703.32	14603710.29	40°12'38.8735"N	80°37'48.1674"W	2343.73	156.077	0.81
7919.00	90.950	337.380	5802.00	-2251.77	-2057.49	915.00	1743667.94	14603795.17	40°12'39.7139"N	80°37'48.6191"W	2251.77	156.024	0.02
8009.00	90.310	337.720	5801.01	-2161.81	-1974.31	880.63	1743633.59	14603878.31	40°12'40.5373"N	80°37'49.0576"W	2161.81	155.961	0.81
8101.00	90.000	335.610	5800.76	-2069.82	-1889.84	844.19	1743597.16	14603962.74	40°12'41.3735"N	80°37'49.5227"W	2069.82	155.930	2.32
8192.00	90.250	334.450	5800.56	-1978.84	-1807.35	805.78	1743558.76	14604045.20	40°12'42.1902"N	80°37'50.0134"W	1978.84	155.971	1.30
8282.00	90.740	335.690	5799.79	-1888.85	-1725.74	767.85	1743520.85	14604126.78	40°12'42.9983"N	80°37'50.4980"W	1888.85	156.014	1.48
8373.00	90.490	335.760	5798.81	-1797.86	-1642.79	730.44	1743483.45	14604209.70	40°12'43.8195"N	80°37'50.9757"W	1797.86	156.029	0.29
8465.00	90.830	336.040	5797.75	-1705.87	-1558.82	692.87	1743445.90	14604293.64	40°12'44.6509"N	80°37'51.4554"W	1705.87	156.036	0.48
8556.00	90.890	335.880	5796.38	-1614.88	-1475.72	655.81	1743408.85	14604376.71	40°12'45.4735"N	80°37'51.9287"W	1614.88	156.040	0.19
8647.00	90.520	336.270	5795.26	-1523.88	-1392.55	618.90	1743371.96	14604459.85	40°12'46.2970"N	80°37'52.3999"W	1523.88	156.038	0.59
8738.00	90.650	335.830	5794.33	-1432.89	-1309.39	581.97	1743335.04	14604542.98	40°12'47.1203"N	80°37'52.8716"W	1432.89	156.037	0.50
8830.00	90.370	335.510	5793.52	-1340.90	-1225.56	544.06	1743297.15	14604626.77	40°12'47.9502"N	80°37'53.3556"W	1340.90	156.062	0.46
8921.00	90.770	335.930	5792.61	-1249.90	-1142.61	506.65	1743259.75	14604709.68	40°12'48.7714"N	80°37'53.8335"W	1249.90	156.087	0.64
9011.00	90.400	335.470	5791.69	-1159.91	-1060.59	469.61	1743222.73	14604791.67	40°12'49.5834"N	80°37'54.3065"W	1159.91	156.117	0.66
9102.00	90.550	336.360	5790.94	-1068.91	-977.52	432.48	1743185.61	14604874.71	40°12'50.4059"N	80°37'54.7807"W	1068.91	156.134	0.99
9193.00	90.950	336.580	5789.75	-977.92	-894.09	396.15	1743149.30	14604958.11	40°12'51.2318"N	80°37'55.2445"W	977.92	156.103	0.50
9284.00	91.020	336.060	5788.18	-886.94	-810.77	359.61	1743112.77	14605041.40	40°12'52.0567"N	80°37'55.7111"W	886.94	156.081	0.58
9376.00	90.920	336.510	5786.62	-794.95	-726.55	322.61	1743075.79	14605125.59	40°12'52.8904"N	80°37'56.1834"W	794.95	156.057	0.50
9467.00	91.020	336.170	5785.08	-703.97	-643.21	286.10	1743039.29	14605208.89	40°12'53.7155"N	80°37'56.6496"W	703.97	156.020	0.39
9558.00	90.620	336.170	5783.78	-612.98	-559.97	249.34	1743002.54	14605292.09	40°12'54.5395"N	80°37'57.1191"W	612.98	155.998	0.44
9647.00	90.650	335.960	5782.79	-523.98	-478.63	213.23	1742966.45	14605373.40	40°12'55.3448"N	80°37'57.5801"W	523.98	155.987	0.24
9739.00	90.620	336.040	5781.78	-431.99	-394.59	175.81	1742929.05	14605457.41	40°12'56.1768"N	80°37'58.0580"W	431.99	155.984	0.09
9830.00	90.550	335.950	5780.85	-340.99	-311.47	138.80	1742892.04	14605540.50	40°12'56.9997"N	80°37'58.5307"W	340.99	155.981	0.13
9920.00	90.580	337.170	5779.96	-251.00	-228.90	103.00	1742856.26	14605623.04	40°12'57.8171"N	80°37'58.9877"W	251.01	155.774	1.36
10012.00	90.340	336.250	5779.22	-159.01	-144.40	66.62	1742819.90	14605707.51	40°12'58.6536"N	80°37'59.4521"W	159.03	155.232	1.03
10103.00	90.340	335.810	5778.68	-68.01	-61.25	29.66	1742782.94	14605790.62	40°12'59.4768"N	80°37'59.9242"W	68.05	154.165	0.48
10193.00	89.850	336.880	5778.53	21.98	21.19	-6.45	1742746.85	14605873.03	40°13'0.2929"N	80°38'0.3853"W	22.15	343.056	1.31
10285.00	90.460	334.820	5778.28	113.98	105.13	-44.09	1742709.23	14605956.94	40°13'1.1239"N	80°38'0.8660"W	114.00	337.246	2.34
10375.00	90.520	335.840	5777.51	203.96	186.91	-81.66	1742671.68	14606038.69	40°13'1.9336"N	80°38'1.3458"W	203.97	336.401	1.14
10466.00	90.860	335.930	5776.42	294.96	269.96	-118.83	1742634.51	14606121.71	40°13'2.7559"N	80°38'1.8207"W	294.96	336.242	0.39



REFERENCE WELLPATH IDENTIFICATION				
Operator	SWN PRODUCTION COMPANY, LLC		Well	Brian Teslovich BRK 1H
Field	Brooke		API	4700900325
Facility	Brian Teslovich BRK Pad		Wellbore	Brian Teslovich BRK 1H AWB
Slot	Slot 1H			

WELLPATH DATA (250 stations)													
MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	Grid East [US ft]	Grid North [US ft]	Latitude	Longitude	Closure Dist [ft]	Closure Dir [°]	DLS [°/100ft]
10557.00	90.490	336.920	5775.34	385.95	353.36	-155.22	1742598.14	14606205.07	40°13'3.5815"N	80°38'2.2853"W	385.95	336.285	1.16
10647.00	90.920	336.590	5774.24	475.93	436.05	-190.74	1742562.63	14606287.73	40°13'4.4000"N	80°38'2.7388"W	475.94	336.374	0.60
10738.00	90.860	337.500	5772.82	566.91	519.83	-226.23	1742527.16	14606371.48	40°13'5.2294"N	80°38'3.1918"W	566.92	336.482	1.00
10829.00	90.060	335.160	5772.09	657.90	603.17	-262.76	1742490.64	14606454.78	40°13'6.0544"N	80°38'3.6582"W	657.91	336.461	2.72
10920.00	90.340	335.500	5771.78	748.89	685.86	-300.74	1742452.68	14606537.44	40°13'6.8731"N	80°38'4.1434"W	748.90	336.323	0.48
11013.00	90.920	336.210	5770.75	841.88	770.72	-338.78	1742414.65	14606622.27	40°13'7.7132"N	80°38'4.6293"W	841.89	336.272	0.99
11105.00	90.950	336.530	5769.25	933.87	854.99	-375.65	1742377.80	14606706.51	40°13'8.5475"N	80°38'5.1001"W	933.88	336.281	0.35
11196.00	90.800	336.630	5767.86	1024.85	938.49	-411.82	1742341.65	14606789.97	40°13'9.3740"N	80°38'5.5619"W	1024.86	336.308	0.20
11286.00	90.430	336.410	5766.90	1114.85	1021.03	-447.67	1742305.80	14606872.48	40°13'10.1912"N	80°38'6.0197"W	1114.86	336.325	0.48
11378.00	90.460	336.680	5766.18	1206.84	1105.42	-484.29	1742269.20	14606956.84	40°13'11.0266"N	80°38'6.4873"W	1206.85	336.342	0.30
11469.00	90.490	336.180	5765.43	1297.83	1188.83	-520.68	1742232.83	14607040.22	40°13'11.8523"N	80°38'6.9519"W	1297.85	336.348	0.55
11559.00	90.890	336.400	5764.34	1387.83	1271.23	-556.86	1742196.65	14607122.58	40°13'12.6680"N	80°38'7.4141"W	1387.84	336.344	0.51
11650.00	90.550	336.590	5763.20	1478.82	1354.67	-593.15	1742160.38	14607205.99	40°13'13.4941"N	80°38'7.8775"W	1478.84	336.353	0.43
11741.00	90.710	335.720	5762.20	1569.81	1437.90	-629.94	1742123.61	14607289.18	40°13'14.3180"N	80°38'8.3473"W	1569.83	336.342	0.97
11831.00	90.890	336.320	5760.94	1659.80	1520.12	-666.51	1742087.05	14607371.38	40°13'15.1320"N	80°38'8.8144"W	1659.82	336.324	0.70
11922.00	90.770	336.070	5759.62	1750.79	1603.37	-703.24	1742050.34	14607454.59	40°13'15.9562"N	80°38'9.2834"W	1750.81	336.318	0.30
12013.00	90.950	336.420	5758.26	1841.78	1686.65	-739.89	1742013.70	14607537.84	40°13'16.7806"N	80°38'9.7515"W	1841.80	336.314	0.43
12104.00	90.710	336.150	5756.94	1932.77	1769.96	-776.49	1741977.12	14607621.12	40°13'17.6053"N	80°38'10.2189"W	1932.79	336.313	0.40
12195.00	90.400	333.940	5756.06	2023.74	1852.45	-814.88	1741938.74	14607703.58	40°13'18.4221"N	80°38'10.7094"W	2023.76	336.256	2.45
12287.00	90.770	335.620	5755.12	2115.71	1935.67	-854.07	1741899.56	14607786.77	40°13'19.2461"N	80°38'11.2103"W	2115.72	336.192	1.87
12377.00	90.710	335.840	5753.96	2205.71	2017.71	-891.06	1741862.58	14607868.78	40°13'20.0583"N	80°38'11.6828"W	2205.71	336.173	0.25
12469.00	90.770	335.030	5752.77	2297.69	2101.38	-929.31	1741824.36	14607952.41	40°13'20.8866"N	80°38'12.1714"W	2297.69	336.143	0.88
12560.00	91.910	332.540	5750.64	2388.59	2182.99	-969.49	1741784.19	14608033.99	40°13'21.6947"N	80°38'12.6851"W	2388.59	336.053	3.01
12650.00	90.860	333.290	5748.46	2478.42	2263.09	-1010.46	1741743.24	14608114.06	40°13'22.4879"N	80°38'13.2090"W	2478.43	335.940	1.43
12742.00	90.740	332.970	5747.18	2570.30	2345.15	-1052.03	1741701.68	14608196.09	40°13'23.3005"N	80°38'13.7407"W	2570.31	335.839	0.37
12834.00	90.770	332.890	5745.97	2662.15	2427.07	-1093.90	1741659.83	14608277.97	40°13'24.1116"N	80°38'14.2761"W	2662.19	335.739	0.09
12921.00	90.860	332.830	5744.73	2749.01	2504.48	-1133.58	1741620.16	14608355.35	40°13'24.8782"N	80°38'14.7835"W	2749.08	335.648	0.12
13012.00	90.800	332.470	5743.41	2839.84	2585.30	-1175.38	1741578.38	14608436.14	40°13'25.6785"N	80°38'15.3182"W	2839.95	335.552	0.40
13102.00	90.680	333.600	5742.25	2929.70	2665.51	-1216.19	1741537.59	14608516.32	40°13'26.4728"N	80°38'15.8400"W	2929.85	335.474	1.26
13193.00	90.770	335.960	5741.10	3020.67	2747.82	-1254.96	1741498.83	14608598.60	40°13'27.2878"N	80°38'16.3355"W	3020.83	335.453	2.60



REFERENCE WELLPATH IDENTIFICATION				
Operator	SWN PRODUCTION COMPANY, LLC		Well	Brian Teslovich BRK 1H
Field	Brooke		API	4700900325
Facility	Brian Teslovich BRK Pad		Wellbore	Brian Teslovich BRK 1H AWB
Slot	Slot 1H			

WELLPATH DATA (250 stations)													
MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	Grid East [US ft]	Grid North [US ft]	Latitude	Longitude	Closure Dist [ft]	Closure Dir [°]	DLS [°/100ft]
13283.00	90.340	337.590	5740.23	3110.65	2830.52	-1290.44	1741463.36	14608681.26	40°13'28.1064"N	80°38'16.7887"W	3110.80	335.492	1.87
13374.00	90.550	337.780	5739.52	3201.61	2914.70	-1325.00	1741428.82	14608765.41	40°13'28.9397"N	80°38'17.2297"W	3201.73	335.554	0.31
13465.00	90.710	338.160	5738.52	3292.56	2999.05	-1359.13	1741394.70	14608849.73	40°13'29.7746"N	80°38'17.6652"W	3292.65	335.621	0.45
13555.00	90.460	338.530	5737.60	3382.48	3082.70	-1392.34	1741361.51	14608933.34	40°13'30.6025"N	80°38'18.0890"W	3382.55	335.693	0.50
13646.00	90.400	338.430	5736.92	3473.40	3167.35	-1425.72	1741328.14	14609017.96	40°13'31.4404"N	80°38'18.5149"W	3473.44	335.766	0.13
13737.00	90.370	337.750	5736.31	3564.33	3251.77	-1459.67	1741294.20	14609102.36	40°13'32.2760"N	80°38'18.9482"W	3564.36	335.825	0.75
13827.00	90.650	338.000	5735.50	3654.29	3335.14	-1493.57	1741260.32	14609185.69	40°13'33.1012"N	80°38'19.3808"W	3654.30	335.876	0.42
13918.00	90.860	337.990	5734.31	3745.23	3419.51	-1527.66	1741226.23	14609270.02	40°13'33.9363"N	80°38'19.8159"W	3745.23	335.927	0.23
14010.00	90.770	338.440	5733.00	3837.15	3504.93	-1561.80	1741192.11	14609355.41	40°13'34.7818"N	80°38'20.2516"W	3837.15	335.982	0.50
14101.00	91.050	338.170	5731.55	3928.07	3589.47	-1595.44	1741158.49	14609439.92	40°13'35.6186"N	80°38'20.6808"W	3928.07	336.036	0.43
14192.00	90.890	335.480	5730.01	4019.04	3673.11	-1631.24	1741122.70	14609523.53	40°13'36.4465"N	80°38'21.1380"W	4019.04	336.054	2.96
14282.00	90.460	335.800	5728.95	4109.03	3755.09	-1668.36	1741085.59	14609605.47	40°13'37.2581"N	80°38'21.6122"W	4109.03	336.045	0.60
14373.00	90.620	336.120	5728.09	4200.02	3838.19	-1705.43	1741048.54	14609688.55	40°13'38.0808"N	80°38'22.0858"W	4200.02	336.043	0.39
14464.00	90.770	335.940	5726.99	4291.02	3921.34	-1742.40	1741011.58	14609771.66	40°13'38.9039"N	80°38'22.5580"W	4291.02	336.043	0.26
14555.00	90.800	336.550	5725.74	4382.01	4004.62	-1779.05	1740974.94	14609854.91	40°13'39.7284"N	80°38'23.0262"W	4382.01	336.047	0.67
14646.00	90.890	336.290	5724.40	4473.00	4088.01	-1815.45	1740938.56	14609938.27	40°13'40.5539"N	80°38'23.4911"W	4473.00	336.054	0.30
14737.00	90.860	336.250	5723.01	4563.99	4171.31	-1852.06	1740901.96	14610021.53	40°13'41.3785"N	80°38'23.9588"W	4563.99	336.059	0.05
14828.00	90.830	336.350	5721.67	4654.97	4254.63	-1888.64	1740865.40	14610104.82	40°13'42.2033"N	80°38'24.4260"W	4654.97	336.063	0.11
14920.00	90.860	336.130	5720.31	4746.96	4338.82	-1925.70	1740828.35	14610188.98	40°13'43.0368"N	80°38'24.8995"W	4746.96	336.067	0.24
15013.00	90.830	335.460	5718.94	4839.95	4423.63	-1963.83	1740790.24	14610273.76	40°13'43.8764"N	80°38'25.3866"W	4839.95	336.062	0.72
15104.00	90.620	335.980	5717.79	4930.94	4506.58	-2001.24	1740752.84	14610356.67	40°13'44.6975"N	80°38'25.8646"W	4930.94	336.055	0.62
15195.00	90.490	335.980	5716.91	5021.94	4589.69	-2038.28	1740715.81	14610439.75	40°13'45.5204"N	80°38'26.3378"W	5021.94	336.054	0.14
15286.00	90.800	336.250	5715.88	5112.93	4672.89	-2075.13	1740678.98	14610522.92	40°13'46.3440"N	80°38'26.8085"W	5112.93	336.055	0.45
15377.00	90.800	336.500	5714.61	5203.92	4756.26	-2111.59	1740642.53	14610606.25	40°13'47.1693"N	80°38'27.2743"W	5203.92	336.061	0.27
15468.00	90.740	336.320	5713.39	5294.91	4839.65	-2148.01	1740606.13	14610689.61	40°13'47.9948"N	80°38'27.7394"W	5294.91	336.067	0.21
15559.00	90.580	336.460	5712.34	5385.90	4923.02	-2184.45	1740569.70	14610772.95	40°13'48.8201"N	80°38'28.2049"W	5385.91	336.072	0.23
15649.00	90.830	336.650	5711.23	5475.89	5005.59	-2220.25	1740533.91	14610855.48	40°13'49.6375"N	80°38'28.6623"W	5475.90	336.080	0.35
15741.00	91.170	336.050	5709.63	5567.88	5089.85	-2257.15	1740497.03	14610939.71	40°13'50.4716"N	80°38'29.1336"W	5567.88	336.085	0.75
15832.00	90.550	335.920	5708.26	5658.87	5172.96	-2294.18	1740460.01	14611022.79	40°13'51.2944"N	80°38'29.6067"W	5658.87	336.083	0.70
15922.00	90.890	335.190	5707.13	5748.86	5254.88	-2331.43	1740422.78	14611104.69	40°13'52.1054"N	80°38'30.0826"W	5748.86	336.075	0.89





# Actual Wellpath Report

Brian Teslovich BRK 1H AWB\_awp 100' - 22139' Proj: 22164'  
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REFERENCE WELLPATH IDENTIFICATION			
Operator	SWN PRODUCTION COMPANY, LLC	Well	Brian Teslovich BRK 1H
Field	Brooke	API	4700900325
Facility	Brian Teslovich BRK Pad	Wellbore	Brian Teslovich BRK 1H AWB
Slot	Slot 1H		

WELLPATH DATA (250 stations)													
MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	Grid East [US ft]	Grid North [US ft]	Latitude	Longitude	Closure Dist [ft]	Closure Dir [°]	DLS [°/100ft]
16013.00	90.430	336.340	5706.08	5839.85	5337.86	-2368.78	1740385.45	14611187.63	40°13'52.9268"N	80°38'30.5598"W	5839.85	336.070	1.36
16105.00	90.950	336.420	5704.98	5931.84	5422.14	-2405.63	1740348.60	14611271.88	40°13'53.7612"N	80°38'31.0307"W	5931.84	336.075	0.57
16195.00	90.800	335.840	5703.60	6021.83	5504.44	-2442.05	1740312.20	14611354.14	40°13'54.5759"N	80°38'31.4959"W	6021.83	336.075	0.67
16287.00	90.860	336.610	5702.27	6113.82	5588.62	-2479.13	1740275.13	14611438.29	40°13'55.4092"N	80°38'31.9697"W	6113.82	336.078	0.84
16380.00	90.860	335.810	5700.87	6206.81	5673.71	-2516.65	1740237.64	14611523.34	40°13'56.2515"N	80°38'32.4489"W	6206.81	336.080	0.86
16472.00	90.680	336.130	5699.64	6298.80	5757.73	-2554.11	1740200.19	14611607.33	40°13'57.0833"N	80°38'32.9275"W	6298.80	336.078	0.40
16565.00	90.370	336.110	5698.78	6391.79	5842.76	-2591.75	1740162.56	14611692.33	40°13'57.9251"N	80°38'33.4085"W	6391.79	336.079	0.33
16656.00	90.580	336.260	5698.03	6482.79	5926.01	-2628.50	1740125.83	14611775.55	40°13'58.7492"N	80°38'33.8779"W	6482.79	336.080	0.28
16746.00	90.680	335.860	5697.04	6572.78	6008.26	-2665.01	1740089.33	14611857.77	40°13'59.5635"N	80°38'34.3445"W	6572.78	336.080	0.46
16837.00	90.800	336.000	5695.86	6663.78	6091.34	-2702.12	1740052.23	14611940.82	40°14'0.3859"N	80°38'34.8187"W	6663.78	336.078	0.20
16928.00	90.980	336.230	5694.45	6754.77	6174.54	-2738.97	1740015.40	14612023.98	40°14'1.2095"N	80°38'35.2894"W	6754.77	336.078	0.32
17019.00	90.580	336.220	5693.21	6845.76	6257.81	-2775.65	1739978.73	14612107.22	40°14'2.0338"N	80°38'35.7580"W	6845.76	336.080	0.44
17112.00	90.800	336.470	5692.09	6938.75	6342.99	-2812.96	1739941.44	14612192.36	40°14'2.8771"N	80°38'36.2347"W	6938.75	336.084	0.36
17202.00	91.050	336.830	5690.64	7028.73	6425.61	-2848.63	1739905.78	14612274.95	40°14'3.6949"N	80°38'36.6903"W	7028.73	336.091	0.49
17293.00	90.800	336.440	5689.17	7119.71	6509.13	-2884.71	1739869.71	14612358.44	40°14'4.5217"N	80°38'37.1512"W	7119.72	336.098	0.51
17384.00	91.020	336.440	5687.72	7210.70	6592.54	-2921.08	1739833.36	14612441.81	40°14'5.3474"N	80°38'37.6158"W	7210.70	336.102	0.24
17474.00	90.650	335.710	5686.41	7300.69	6674.79	-2957.58	1739796.88	14612524.04	40°14'6.1617"N	80°38'38.0821"W	7300.69	336.102	0.91
17565.00	90.920	336.460	5685.17	7391.68	6757.97	-2994.46	1739760.01	14612607.19	40°14'6.9851"N	80°38'38.5534"W	7391.68	336.102	0.88
17656.00	90.520	335.800	5684.02	7482.67	6841.18	-3031.28	1739723.20	14612690.36	40°14'7.8088"N	80°38'39.0239"W	7482.68	336.102	0.85
17746.00	90.620	335.920	5683.13	7572.67	6923.31	-3068.09	1739686.41	14612772.46	40°14'8.6218"N	80°38'39.4942"W	7572.67	336.099	0.17
17838.00	90.800	335.660	5681.99	7664.66	7007.21	-3105.81	1739648.70	14612856.33	40°14'9.4524"N	80°38'39.9763"W	7664.66	336.096	0.34
17929.00	90.650	336.390	5680.84	7755.65	7090.35	-3142.79	1739611.74	14612939.44	40°14'10.2755"N	80°38'40.4487"W	7755.65	336.095	0.82
18019.00	90.950	336.340	5679.58	7845.64	7172.79	-3178.86	1739575.68	14613021.85	40°14'11.0916"N	80°38'40.9097"W	7845.64	336.098	0.34
18111.00	90.950	336.100	5678.05	7937.63	7256.97	-3215.96	1739538.60	14613105.99	40°14'11.9249"N	80°38'41.3836"W	7937.63	336.099	0.26
18203.00	90.650	335.560	5676.77	8029.62	7340.90	-3253.62	1739500.95	14613189.88	40°14'12.7557"N	80°38'41.8649"W	8029.62	336.096	0.67
18293.00	90.650	336.220	5675.75	8119.61	7423.04	-3290.38	1739464.20	14613271.99	40°14'13.5689"N	80°38'42.3347"W	8119.61	336.094	0.73
18384.00	90.800	336.560	5674.60	8210.60	7506.42	-3326.83	1739427.77	14613355.34	40°14'14.3942"N	80°38'42.8003"W	8210.61	336.097	0.41
18474.00	90.460	336.170	5673.61	8300.60	7588.86	-3362.91	1739391.71	14613437.75	40°14'15.2104"N	80°38'43.2613"W	8300.60	336.100	0.57
18566.00	90.400	336.400	5672.92	8392.59	7673.09	-3399.91	1739354.72	14613521.95	40°14'16.0442"N	80°38'43.7340"W	8392.60	336.102	0.26
18655.00	90.710	336.350	5672.06	8481.59	7754.63	-3435.57	1739319.07	14613603.45	40°14'16.8513"N	80°38'44.1897"W	8481.59	336.105	0.35



REFERENCE WELLPATH IDENTIFICATION				
Operator	SWN PRODUCTION COMPANY, LLC		Well	Brian Teslovich BRK 1H
Field	Brooke		API	4700900325
Facility	Brian Teslovich BRK Pad		Wellbore	Brian Teslovich BRK 1H AWB
Slot	Slot 1H			

WELLPATH DATA (250 stations)													
MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	Grid East [US ft]	Grid North [US ft]	Latitude	Longitude	Closure Dist [ft]	Closure Dir [°]	DLS [°/100ft]
18745.00	90.310	336.020	5671.25	8571.58	7836.96	-3471.91	1739282.74	14613685.75	40°14'17.6664"N	80°38'44.6540"W	8571.59	336.106	0.58
18836.00	91.110	337.840	5670.13	8662.56	7920.67	-3507.56	1739247.10	14613769.43	40°14'18.4950"N	80°38'45.1095"W	8662.57	336.114	2.18
18928.00	90.460	335.740	5668.87	8754.54	8005.21	-3543.82	1739210.87	14613853.94	40°14'19.3318"N	80°38'45.5726"W	8754.55	336.122	2.39
19018.00	90.430	335.700	5668.17	8844.53	8087.25	-3580.82	1739173.87	14613935.95	40°14'20.1440"N	80°38'46.0455"W	8844.54	336.117	0.06
19109.00	90.620	335.020	5667.33	8935.52	8169.96	-3618.76	1739135.95	14614018.62	40°14'20.9628"N	80°38'46.5305"W	8935.53	336.110	0.78
19199.00	90.800	335.430	5666.22	9025.51	8251.67	-3656.47	1739098.25	14614100.30	40°14'21.7717"N	80°38'47.0126"W	9025.51	336.101	0.50
19290.00	90.460	335.300	5665.22	9116.49	8334.38	-3694.40	1739060.34	14614182.98	40°14'22.5906"N	80°38'47.4974"W	9116.50	336.094	0.40
19381.00	90.890	335.260	5664.15	9207.48	8417.04	-3732.45	1739022.30	14614265.60	40°14'23.4089"N	80°38'47.9838"W	9207.48	336.086	0.47
19471.00	90.620	335.610	5662.96	9297.47	8498.88	-3769.87	1738984.90	14614347.42	40°14'24.2191"N	80°38'48.4620"W	9297.47	336.079	0.49
19562.00	90.680	335.960	5661.93	9388.46	8581.87	-3807.19	1738947.60	14614430.37	40°14'25.0407"N	80°38'48.9390"W	9388.46	336.076	0.39
19652.00	90.250	336.330	5661.20	9478.46	8664.18	-3843.58	1738911.21	14614512.65	40°14'25.8555"N	80°38'49.4041"W	9478.46	336.077	0.63
19743.00	90.000	335.980	5661.00	9569.46	8747.41	-3880.37	1738874.44	14614595.85	40°14'26.6794"N	80°38'49.8743"W	9569.46	336.078	0.47
19835.00	90.060	336.160	5660.95	9661.46	8831.50	-3917.69	1738837.14	14614679.91	40°14'27.5118"N	80°38'50.3511"W	9661.46	336.078	0.21
19927.00	90.120	335.590	5660.81	9753.45	8915.47	-3955.29	1738799.55	14614763.84	40°14'28.3430"N	80°38'50.8317"W	9753.46	336.076	0.62
20019.00	90.400	336.070	5660.39	9845.45	8999.40	-3992.96	1738761.90	14614847.74	40°14'29.1739"N	80°38'51.3132"W	9845.45	336.074	0.60
20109.00	89.910	335.610	5660.14	9935.45	9081.52	-4029.80	1738725.08	14614929.82	40°14'29.9868"N	80°38'51.7840"W	9935.45	336.071	0.75
20202.00	91.320	335.990	5659.15	10028.44	9166.34	-4067.92	1738686.97	14615014.61	40°14'30.8265"N	80°38'52.2712"W	10028.44	336.069	1.57
20293.00	91.570	336.780	5656.85	10119.41	9249.69	-4104.36	1738650.54	14615097.93	40°14'31.6516"N	80°38'52.7368"W	10119.41	336.072	0.91
20383.00	90.800	336.230	5654.99	10209.39	9332.21	-4140.23	1738614.69	14615180.42	40°14'32.4685"N	80°38'53.1952"W	10209.39	336.076	1.05
20474.00	90.340	335.680	5654.08	10300.38	9415.31	-4177.31	1738577.62	14615263.49	40°14'33.2911"N	80°38'53.6690"W	10300.38	336.074	0.79
20567.00	90.770	336.030	5653.18	10393.38	9500.17	-4215.35	1738539.60	14615348.31	40°14'34.1311"N	80°38'54.1552"W	10393.38	336.073	0.60
20657.00	90.650	335.480	5652.07	10483.37	9582.22	-4252.30	1738502.66	14615430.33	40°14'34.9434"N	80°38'54.6276"W	10483.37	336.070	0.63
20748.00	90.740	336.130	5650.96	10574.36	9665.22	-4289.59	1738465.38	14615513.30	40°14'35.7651"N	80°38'55.1042"W	10574.36	336.068	0.72
20839.00	90.800	335.710	5649.74	10665.35	9748.29	-4326.72	1738428.27	14615596.34	40°14'36.5875"N	80°38'55.5788"W	10665.35	336.066	0.47
20931.00	90.800	336.580	5648.46	10757.34	9832.43	-4363.92	1738391.08	14615680.44	40°14'37.4203"N	80°38'56.0542"W	10757.34	336.067	0.95
21023.00	90.580	336.080	5647.35	10849.33	9916.68	-4400.85	1738354.16	14615764.66	40°14'38.2543"N	80°38'56.5262"W	10849.33	336.069	0.59
21113.00	90.550	336.030	5646.46	10939.33	9998.93	-4437.38	1738317.65	14615846.88	40°14'39.0685"N	80°38'56.9930"W	10939.33	336.069	0.06
21205.00	90.460	335.760	5645.65	11031.33	10082.90	-4474.95	1738280.09	14615930.82	40°14'39.8998"N	80°38'57.4732"W	11031.33	336.068	0.31
21296.00	90.120	335.600	5645.19	11122.32	10165.83	-4512.43	1738242.63	14616013.71	40°14'40.7207"N	80°38'57.9523"W	11122.32	336.064	0.41
21386.00	90.550	335.760	5644.66	11212.32	10247.84	-4549.49	1738205.58	14616095.69	40°14'41.5326"N	80°38'58.4261"W	11212.32	336.061	0.51



REFERENCE WELLPATH IDENTIFICATION			
Operator	SWN PRODUCTION COMPANY, LLC	Well	Brian Teslovich BRK 1H
Field	Brooke	API	4700900325
Facility	Brian Teslovich BRK Pad	Wellbore	Brian Teslovich BRK 1H AWB
Slot	Slot 1H		

WELLPATH DATA (250 stations) † = interpolated, ‡ = extrapolated station													
MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	Grid East [US ft]	Grid North [US ft]	Latitude	Longitude	Closure Dist [ft]	Closure Dir [°]	DLS [°/100ft]
21477.00	90.490	336.040	5643.84	11303.31	10330.90	-4586.65	1738168.44	14616178.73	40°14'42.3549"N	80°38'58.9010"W	11303.31	336.060	0.31
21567.00	90.550	336.150	5643.02	11393.31	10413.18	-4623.12	1738131.99	14616260.97	40°14'43.1693"N	80°38'59.3671"W	11393.31	336.060	0.14
21658.00	90.680	336.200	5642.04	11484.31	10496.42	-4659.87	1738095.24	14616344.18	40°14'43.9933"N	80°38'59.8369"W	11484.31	336.061	0.15
21750.00	90.460	336.050	5641.13	11576.30	10580.54	-4697.11	1738058.02	14616428.27	40°14'44.8261"N	80°39'0.3128"W	11576.30	336.062	0.29
21840.00	90.650	335.970	5640.26	11666.30	10662.77	-4733.70	1738021.45	14616510.46	40°14'45.6400"N	80°39'0.7804"W	11666.30	336.061	0.23
21931.00	90.740	335.730	5639.15	11757.29	10745.80	-4770.93	1737984.23	14616593.45	40°14'46.4619"N	80°39'1.2563"W	11757.29	336.060	0.28
22023.00	90.800	335.430	5637.92	11849.28	10829.56	-4808.96	1737946.22	14616677.18	40°14'47.2911"N	80°39'1.7425"W	11849.28	336.056	0.33
22113.00	90.550	335.900	5636.86	11939.27	10911.55	-4846.04	1737909.15	14616759.15	40°14'48.1029"N	80°39'2.2166"W	11939.27	336.053	0.59
22139.00	90.550	336.130	5636.61	11965.27	10935.31	-4856.61	1737898.58	14616782.89	40°14'48.3380"N	80°39'2.3516"W	11965.27	336.053	0.88
22164.00‡	90.550	336.130	5636.37	11990.27	10958.17	-4866.73	1737888.47	14616805.75	40°14'48.5643"N	80°39'2.4809"W	11990.27	336.053	0.00

HOLE & CASING SECTIONS									
- Ref Wellbore: Brian Teslovich BRK 1H AWB    Ref Wellpath: Brian Teslovich BRK 1H AWB_awp 100' - 22139' Proj: 22164'									
String/Diameter	Start MD [ft]	End MD [ft]	Interval [ft]	Start TVD [ft]	End TVD [ft]	Start N/S [ft]	Start E/W [ft]	End N/S [ft]	End E/W [ft]
13.375in Casing	26.00	320.00	294.00	26.00	320.00	0.00	0.00	-0.53	-0.62
9.625in Casing	26.00	1624.00	1598.00	26.00	1604.05	0.00	0.00	-182.85	-3.81
5.5in Casing	26.00	22190.00	22164.00	26.00	N/A	0.00	0.00	N/A	N/A

REFERENCE WELLPATH IDENTIFICATION			
Operator	SWN PRODUCTION COMPANY, LLC	Well	Brian Teslovich BRK 1H
Field	Brooke	API	4700900325
Facility	Brian Teslovich BRK Pad	Wellbore	Brian Teslovich BRK 1H AWB
Slot	Slot 1H		

TARGETS								
Name	TVD [ft]	North [ft]	East [ft]	Grid East [US ft]	Grid North [US ft]	Latitude	Longitude	Shape
Brian Teslovich BRK 1H BHL Rev 5	5636.00	10960.54	-4864.15	1737891.05	14616808.11	40°14'48.5876"N	80°39'2.4476"W	point
Brian Teslovich BRK 1H LP rev 5	5805.00	-2755.49	1227.65	1743980.47	14603097.44	40°12'32.8035"N	80°37'44.6268"W	point

WELLPATH COMPOSITION - Ref Wellbore: Brian Teslovich BRK 1H AWB Ref Wellpath: Brian Teslovich BRK 1H AWB_awp 100' - 22139' Proj: 22164'					
Start MD [ft]	End MD [ft]	Positional Uncertainty Model	Log Name/Comment	Wellbore	Survey Date
26.00	400.00	BH Generic gyro - northseeking (Standard)	1 17.5 Imported Gyro 100' - 400'	Brian Teslovich BRK 1H AWB	11/18/2021
400.00	1582.00	OWSG MWD rev2 + HRGM	2, 12.25 Imported Tally MWD 509' - 1582'	Brian Teslovich BRK 1H AWB	11/18/2021
1582.00	22164.00	BH AutoTrak Curve/eXpress (2019) (HRGM, Short spacing)	3 8.75 BH MWD 1680' - 22139'	Brian Teslovich BRK 1H AWB	11/18/2021