



# Actual Wellpath Report

Gary Keetner OHI 410H AWP Proj: 18232



Operator	SWN PRODUCTION COMPANY, LLC	Well	Gary Keetner OHI 410H
Field	Ohio	API/Legal	
Facility	Gary Keetner OHI Pad	Wellbore	Gary Keetner OHI 410H AWB
Slot	Slot #410		

WELLPATH DATA (227 stations) † = interpolated, ‡ = extrapolated station															
MD	Inclination	Azimuth	TVD	Vert Sect	North	East	Grid East	Grid North	Latitude	Longitude	Closure Dist	Closure Dir	DLS	Build Rate	Turn Rate
(ft)	[°]	[°]	(ft)	(ft)	(ft)	(ft)	(US ft)	(US ft)			(ft)	[°]	[°/100ft]	[°/100ft]	[°/100ft]
0.00	0.000	93.450	0.00	0.00	0.00	0.00	1768624.21	14581171.04	40°08'54.9069"N	80°32'28.3347"W	0.00	0.00	0.00	0.00	0.00
26.00	0.000	93.450	26.00	0.00	0.00	0.00	1768624.21	14581171.04	40°08'54.9069"N	80°32'28.3347"W	0.00	0.00	0.00	0.00	0.00
100.00	0.420	93.450	100.00	0.12	-0.02	0.27	1768624.48	14581171.03	40°08'54.9068"N	80°32'28.3312"W	0.27	0.27	93.450	0.57	0.00
125.00	0.440	79.930	125.00	0.18	-0.01	0.46	1768624.67	14581171.02	40°08'54.9069"N	80°32'28.3288"W	0.46	0.66	90.634	0.41	0.08
150.00	0.480	84.550	150.00	0.23	0.02	0.66	1768624.87	14581171.06	40°08'54.9071"N	80°32'28.3262"W	0.66	0.66	88.106	0.22	0.16
175.00	0.590	89.980	175.00	0.31	0.03	0.89	1768625.10	14581171.07	40°08'54.9072"N	80°32'28.3232"W	0.89	0.89	87.958	0.48	0.44
200.00	0.490	86.540	200.00	0.40	0.04	1.12	1768625.33	14581171.08	40°08'54.9073"N	80°32'28.3202"W	1.12	1.12	88.055	0.42	-0.40
225.00	0.460	87.680	224.99	0.46	0.05	1.33	1768625.54	14581171.09	40°08'54.9073"N	80°32'28.3175"W	1.33	1.33	87.905	0.13	-0.12
250.00	0.450	86.320	249.99	0.53	0.06	1.53	1768625.74	14581171.10	40°08'54.9074"N	80°32'28.3150"W	1.53	1.53	87.789	0.06	-0.04
275.00	0.570	92.220	274.99	0.61	0.06	1.75	1768625.96	14581171.10	40°08'54.9074"N	80°32'28.3121"W	1.75	1.75	88.021	0.52	0.48
300.00	0.530	92.340	299.99	0.72	0.05	1.99	1768626.20	14581171.09	40°08'54.9073"N	80°32'28.3090"W	1.99	1.99	88.533	0.16	-0.16
325.00	0.520	104.330	324.99	0.83	0.02	2.22	1768626.43	14581171.06	40°08'54.9070"N	80°32'28.3061"W	2.22	2.22	89.530	0.44	-0.04
350.00	0.510	104.900	349.99	0.97	-0.04	2.43	1768626.64	14581171.00	40°08'54.9064"N	80°32'28.3033"W	2.43	2.43	90.906	0.04	-0.04
375.00	0.550	110.500	374.99	1.12	-0.11	2.65	1768626.86	14581170.93	40°08'54.9057"N	80°32'28.3005"W	2.66	2.66	92.355	0.26	0.16
400.00	0.480	118.310	399.99	1.28	-0.20	2.86	1768627.07	14581170.84	40°08'54.9048"N	80°32'28.2979"W	2.87	2.87	94.018	0.40	-0.28
425.00	0.530	121.410	424.99	1.45	-0.31	3.05	1768627.26	14581170.73	40°08'54.9037"N	80°32'28.2954"W	3.07	3.07	95.818	0.23	0.20
450.00	0.600	118.210	449.99	1.65	-0.43	3.26	1768627.47	14581170.61	40°08'54.9025"N	80°32'28.2927"W	3.29	3.29	97.556	0.31	0.28
475.00	0.910	121.190	474.98	1.91	-0.60	3.55	1768627.76	14581170.44	40°08'54.9008"N	80°32'28.2890"W	3.60	3.60	99.559	1.25	1.24
500.00	0.950	129.250	499.98	2.25	-0.83	3.88	1768628.09	14581170.21	40°08'54.8985"N	80°32'28.2848"W	3.97	3.97	102.099	0.55	0.16
525.00	1.340	134.680	524.98	2.71	-1.17	4.25	1768628.46	14581169.87	40°08'54.8952"N	80°32'28.2801"W	4.40	4.40	105.378	1.62	1.56
550.00	1.320	132.620	549.97	3.24	-1.57	4.67	1768628.88	14581169.47	40°08'54.8912"N	80°32'28.2747"W	4.92	4.92	108.579	0.21	-0.08
575.00	1.370	127.270	574.96	3.76	-1.94	5.12	1768629.32	14581169.10	40°08'54.8875"N	80°32'28.2689"W	5.47	5.47	110.810	0.54	0.20
600.00	1.430	136.630	599.95	4.31	-2.35	5.57	1768629.78	14581168.69	40°08'54.8834"N	80°32'28.2631"W	6.05	6.05	112.901	0.94	0.24
625.00	1.500	142.360	624.95	4.91	-2.84	5.98	1768630.19	14581168.20	40°08'54.8786"N	80°32'28.2578"W	6.62	6.62	115.380	0.65	0.28
650.00	1.620	147.660	649.94	5.58	-3.40	6.37	1768630.58	14581167.65	40°08'54.8730"N	80°32'28.2529"W	7.22	7.22	118.057	0.75	0.48
660.00	1.480	150.180	659.93	5.84	-3.63	6.51	1768630.72	14581167.41	40°08'54.8708"N	80°32'28.2511"W	7.45	7.45	119.121	1.56	-1.40
788.00	1.110	152.670	787.90	8.72	-6.16	7.90	1768632.11	14581164.88	40°08'54.8456"N	80°32'28.2333"W	10.02	10.02	127.949	0.29	-0.29
878.00	1.270	61.930	877.89	9.49	-6.47	9.18	1768633.39	14581164.57	40°08'54.8425"N	80°32'28.2169"W	11.23	11.23	125.159	1.89	0.18
969.00	2.810	24.640	969.83	7.88	-3.97	11.00	1768635.21	14581167.08	40°08'54.8672"N	80°32'28.1933"W	11.70	11.70	109.821	2.15	1.69
1060.00	5.190	17.970	1059.60	3.23	1.98	13.20	1768637.41	14581173.02	40°08'54.9258"N	80°32'28.1645"W	13.35	13.35	81.481	2.66	2.62

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**Baker Hughes**

Operator	SWN PRODUCTION COMPANY, LLC
Field	Ohio
Facility	Gary Kestner OHI Pad
Slot	Slot #410
	Gary Kestner OHI 410H AWP
	Wellbore
	API/Legal
	Gary Kestner OHI 410H
	Well

## WELLPATH DATA (227 stations)

MD	Inclination	Azimuth	TVD	Vert Sect	North	East	Grid East	Grid North	Latitude	Longitude	Closure Dist	Closure Dir	DLS	Build Rate	Turn Rate
[ft]	[°]	[°]	[ft]	[ft]	[ft]	[ft]	[US ft]	[US ft]			[ft]	[°]	[°/100ft]	[°/100ft]	[°/100ft]
1150.00	6.750	9.040	1149.11	-4.37	11.07	15.29	1768639.49	14581182.11	40°08'55.0156"N	80°32'28.1370"W	18.88	54.086	2.01	1.73	-9.92
1241.00	6.060	11.470	1239.54	-12.91	21.06	17.09	1768641.29	14581192.10	40°08'55.1142"N	80°32'28.1133"W	27.12	39.048	0.81	-0.76	2.67
1332.00	4.490	15.460	1330.16	-19.70	29.20	18.99	1768643.19	14581200.23	40°08'55.1946"N	80°32'28.0882"W	34.84	33.035	1.77	-1.73	4.38
1422.00	4.130	18.010	1419.90	-24.94	35.68	20.93	1768645.13	14581206.71	40°08'55.2585"N	80°32'28.0628"W	41.37	30.397	0.45	-0.40	2.83
1513.00	3.490	15.070	1510.70	-29.63	41.47	22.67	1768646.87	14581212.50	40°08'55.3156"N	80°32'28.0401"W	47.26	28.657	0.74	-0.70	-3.23
1603.00	3.130	11.670	1600.55	-33.83	46.52	23.87	1768648.08	14581217.55	40°08'55.3655"N	80°32'28.0241"W	52.29	27.165	0.46	-0.40	-3.78
1694.00	1.810	20.520	1691.46	-36.94	50.30	24.88	1768649.08	14581221.32	40°08'55.4028"N	80°32'28.0109"W	56.12	26.318	1.51	-1.45	9.73
1785.00	1.070	34.470	1782.44	-38.45	52.35	25.87	1768650.07	14581223.37	40°08'55.4229"N	80°32'27.9981"W	58.39	26.293	0.89	-0.81	15.33
1875.00	0.460	39.720	1872.43	-39.08	53.32	26.57	1768650.77	14581224.34	40°08'55.4325"N	80°32'27.9890"W	59.57	26.489	0.68	-0.66	5.83
1966.00	0.260	130.480	1963.43	-39.06	53.47	26.96	1768651.16	14581224.49	40°08'55.4339"N	80°32'27.9839"W	59.88	26.761	0.58	-0.22	99.74
2000.00	0.390	154.200	1997.43	-38.88	53.31	27.07	1768651.27	14581224.33	40°08'55.4324"N	80°32'27.9825"W	59.79	26.921	0.54	0.38	69.76
2073.00	0.500	137.500	2070.42	-38.33	52.85	27.39	1768651.59	14581223.87	40°08'55.4278"N	80°32'27.9784"W	59.53	27.398	0.23	0.15	-22.88
2164.00	0.470	164.140	2161.42	-37.59	52.20	27.76	1768651.96	14581223.22	40°08'55.4214"N	80°32'27.9737"W	59.13	28.007	0.25	-0.03	29.27
2254.00	0.400	138.410	2251.42	-36.92	51.61	28.07	1768652.27	14581222.63	40°08'55.4155"N	80°32'27.9697"W	58.75	28.544	0.23	-0.08	-28.59
2345.00	0.420	172.780	2342.41	-36.33	51.17	28.55	1768652.75	14581222.19	40°08'55.4111"N	80°32'27.9636"W	58.60	29.158	0.09	0.02	-11.68
2436.00	2.550	73.530	2433.38	-35.83	51.54	30.75	1768654.95	14581222.56	40°08'55.4147"N	80°32'27.9352"W	60.02	30.824	2.56	2.34	-59.62
2526.00	3.310	67.080	2523.26	-35.64	53.12	35.07	1768659.26	14581224.14	40°08'55.4301"N	80°32'27.8796"W	63.65	33.431	0.92	0.84	-7.17
2617.00	3.460	63.610	2614.10	-35.84	55.36	39.95	1768664.14	14581226.38	40°08'55.4520"N	80°32'27.8166"W	68.27	35.812	0.28	0.16	-3.81
2708.00	5.710	59.490	2704.81	-36.66	58.88	46.31	1768670.50	14581229.90	40°08'55.4864"N	80°32'27.7344"W	74.91	38.183	2.50	2.47	-4.53
2798.00	6.490	56.790	2794.30	-38.22	63.94	54.42	1768678.61	14581234.96	40°08'55.5360"N	80°32'27.6296"W	83.97	40.401	0.92	0.87	-3.00
2889.00	7.280	58.630	2884.64	-40.06	69.76	63.65	1768687.83	14581240.77	40°08'55.5930"N	80°32'27.5104"W	94.43	42.376	0.90	0.87	2.02
2980.00	8.330	63.720	2974.80	-41.38	75.68	74.48	1768698.66	14581246.69	40°08'55.6510"N	80°32'27.3705"W	106.18	44.542	1.38	1.15	5.59
3070.00	10.770	69.290	3063.55	-41.55	81.54	88.19	1768712.37	14581252.55	40°08'55.7082"N	80°32'27.1935"W	120.11	47.244	2.90	2.71	6.19
3161.00	13.720	69.150	3152.47	-40.96	88.39	106.24	1768730.40	14581259.40	40°08'55.7750"N	80°32'26.9608"W	138.20	50.239	3.24	3.24	-0.15
3252.00	15.400	68.270	3240.54	-40.48	96.71	127.55	1768751.71	14581267.71	40°08'55.8561"N	80°32'26.6858"W	160.06	52.830	1.86	1.85	-0.97
3342.00	15.620	65.240	3327.26	-40.79	106.20	149.65	1768773.80	14581277.20	40°08'55.9488"N	80°32'26.4005"W	183.51	54.637	0.93	0.24	-3.37
3433.00	17.620	67.710	3414.46	-41.21	116.56	173.52	1768797.66	14581287.56	40°08'55.0499"N	80°32'26.0924"W	209.04	56.109	2.33	2.20	2.71
3524.00	19.860	70.820	3500.63	-40.26	126.87	200.87	1768825.00	14581297.86	40°08'55.1503"N	80°32'25.7396"W	237.58	57.724	2.69	2.46	3.42
3614.00	22.010	71.360	3584.69	-38.23	137.28	231.29	1768855.41	14581308.27	40°08'55.2517"N	80°32'25.3471"W	268.96	59.309	2.40	2.39	0.60
3705.00	23.960	69.500	3668.46	-36.42	149.20	264.76	1768888.87	14581320.18	40°08'55.3678"N	80°32'24.9153"W	303.91	60.597	2.29	2.14	-2.04

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**Baker Hughes**

Operator	SWN PRODUCTION COMPANY, LLC
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Slot	Slot #410
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## WELLPATH DATA (227 stations)

MD	Inclination	Azimuth	TVD	Vert Sect	North	East	Grid East	Grid North	Latitude	Longitude	Closure Dist	Closure Dir	DLS	Build Rate	Turn Rate
3795.00	25.610	68.060	3750.17	-35.58	162.87	299.92	1768924.02	14581333.85	40°08'56.5011"N	80°32'24.4616"W	341.29	61.496	1.95	1.83	-1.60
3886.00	27.530	66.350	3831.55	-35.79	178.66	337.43	1769001.90	14581349.63	40°08'56.6525"N	80°32'23.9775"W	381.81	62.101	2.27	2.11	-1.88
3977.00	28.820	66.640	3911.77	-36.53	195.79	376.84	1769042.11	14581384.62	40°08'56.9970"N	80°32'22.9369"W	469.49	62.929	2.51	2.51	-0.17
4067.00	31.080	66.490	3989.74	-37.25	213.66	418.06	1769042.11	14581384.62	40°08'56.9970"N	80°32'22.9369"W	469.49	62.929	2.51	2.51	-0.17
4158.00	32.320	67.560	4067.17	-37.62	232.32	462.08	1769086.12	14581403.27	40°08'57.1791"N	80°32'22.3687"W	517.20	63.308	1.50	1.36	1.18
4248.00	33.510	67.630	4142.72	-37.52	250.96	507.30	1769131.31	14581421.90	40°08'57.3609"N	80°32'21.7853"W	565.98	63.679	1.32	1.32	0.08
4339.00	32.500	65.580	4219.03	-38.27	270.63	552.79	1769176.79	14581441.56	40°08'57.5530"N	80°32'21.1981"W	615.48	63.915	1.65	-1.11	-2.25
4430.00	32.850	66.830	4295.63	-39.36	290.44	597.74	1769221.72	14581461.37	40°08'57.7465"N	80°32'20.6179"W	664.57	64.085	0.84	0.38	1.37
4520.00	31.490	65.670	4371.82	-40.38	309.73	641.60	1769265.56	14581480.65	40°08'57.9349"N	80°32'20.0518"W	712.45	64.231	1.66	-1.51	-1.29
4611.00	33.290	66.060	4448.66	-41.75	329.66	686.09	1769310.03	14581500.57	40°08'58.1295"N	80°32'19.4776"W	761.18	64.336	1.99	1.98	0.43
4702.00	32.930	65.360	4524.88	-43.28	350.11	731.39	1769355.32	14581521.01	40°08'58.3292"N	80°32'18.8928"W	810.87	64.420	0.58	-0.40	-0.77
4792.00	32.710	68.390	4600.52	-43.80	369.26	776.24	1769400.15	14581540.16	40°08'58.5162"N	80°32'18.3140"W	859.60	64.559	1.84	-0.24	3.37
4883.00	31.190	67.630	4677.73	-43.35	387.29	820.89	1769444.79	14581558.18	40°08'58.6921"N	80°32'17.7378"W	907.67	64.743	1.73	-1.67	-0.84
4973.00	32.500	66.940	4754.18	-43.52	405.63	864.69	1769488.57	14581576.51	40°08'58.8711"N	80°32'17.1725"W	955.11	64.869	1.51	1.46	-0.77
5064.00	34.280	67.500	4830.16	-43.74	425.01	910.87	1769534.73	14581595.89	40°08'59.0602"N	80°32'16.5766"W	1005.14	64.986	1.99	1.96	0.62
5154.00	33.320	66.470	4904.95	-44.16	444.58	956.95	1769580.79	14581615.45	40°08'59.2512"N	80°32'15.9819"W	1055.18	65.081	1.24	-1.07	-1.14
5245.00	33.860	65.260	4980.75	-45.59	465.17	1002.89	1769626.71	14581636.03	40°08'59.4523"N	80°32'15.3889"W	1105.52	65.117	0.95	0.59	-1.33
5336.00	34.570	65.170	5056.00	-47.61	486.62	1049.34	1769673.15	14581657.47	40°08'59.6619"N	80°32'14.7892"W	1156.69	65.121	0.78	0.78	-0.10
5426.00	32.620	63.330	5130.97	-50.39	508.23	1094.20	1769717.99	14581679.08	40°08'59.8732"N	80°32'14.2101"W	1206.47	65.086	2.44	-2.17	-2.04
5517.00	31.980	65.290	5207.89	-53.09	529.32	1138.01	1769761.78	14581700.15	40°09'0.0793"N	80°32'13.6445"W	1256.09	65.056	1.35	-0.70	2.15
5608.00	31.890	68.170	5285.12	-53.72	548.33	1182.22	1769805.97	14581719.16	40°09'0.2649"N	80°32'13.0740"W	1303.19	65.117	1.68	-0.10	3.16
5698.00	32.290	69.260	5361.37	-52.69	565.68	1226.77	1769850.51	14581736.51	40°09'0.4341"N	80°32'12.4991"W	1350.91	65.245	0.78	0.44	1.21
5789.00	31.560	68.610	5438.61	-51.46	582.98	1271.67	1769895.40	14581753.79	40°09'0.6027"N	80°32'11.9197"W	1398.93	65.372	0.89	-0.80	-0.71
5856.00	29.930	66.410	5496.19	-51.43	596.06	1303.32	1769927.03	14581766.87	40°09'0.7303"N	80°32'11.5112"W	1433.16	65.423	2.96	-2.43	-3.28
5946.00	31.700	64.060	5573.48	-53.26	615.39	1345.17	1769968.86	14581786.20	40°09'0.9192"N	80°32'10.9711"W	1479.25	65.417	2.38	1.97	-2.61
6037.00	31.680	66.240	5650.92	-55.20	635.48	1388.54	1770012.22	14581806.28	40°09'1.1155"N	80°32'10.4112"W	1527.05	65.408	1.26	-0.02	2.40
6128.00	31.600	77.550	5728.46	-51.55	650.26	1433.73	1770057.39	14581821.05	40°09'1.2592"N	80°32'9.8282"W	1574.30	65.604	6.51	-0.09	12.43
6218.00	31.680	88.060	5805.14	-39.11	656.15	1480.41	1770104.05	14581826.94	40°09'1.3150"N	80°32'9.2267"W	1619.30	66.096	6.12	0.09	11.68
6309.00	31.390	102.480	5882.82	-17.08	651.83	1527.50	1770151.12	14581822.62	40°09'1.2699"N	80°32'8.6206"W	1660.76	66.891	8.28	-0.32	15.85
6399.00	31.690	114.970	5959.60	13.82	636.77	1571.86	1770195.47	14581807.56	40°09'1.1187"N	80°32'8.0503"W	1695.94	67.947	7.26	0.33	13.88

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# Actual Wellpath Report

Gary Kestner OHI 410H AWP Proj: 18232

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Operator	SWN PRODUCTION COMPANY, LLC
Field	Ohio
Facility	Gary Kestner OHI Pad
Slot	Slot #410
	Gary Kestner OHI 410H AWB
	Wellbore
	API/Legal
	Gary Kestner OHI 410H
	Well

## WELLPATH DATA (227 stations)

MD	Inclination	Azimuth	TVD	Vert Sect	North	East	Grid East	Grid North	Latitude	Longitude	Closure Dist	Closure Dir	DLS	Build Rate	Turn Rate
(ft)	(°)	(°)	(ft)	(ft)	(ft)	(ft)	(US ft)	(US ft)			(ft)	(°)	(°/100ft)	(°/100ft)	(°/100ft)
6490.00	31.660	126.900	6037.12	52.04	612.32	1612.67	1770236.26	14581783.12	40°09'0.8750"N	80°32'7.5265"W	1725.00	69.209	6.88	-0.03	13.11
6580.00	33.270	137.850	6113.12	95.66	579.80	1648.15	1770271.73	14581750.62	40°09'0.5518"N	80°32'7.0717"W	1747.16	70.619	6.76	1.79	12.17
6611.00	37.040	146.450	6187.56	146.13	538.41	1680.08	1770303.65	14581709.25	40°09'0.1412"N	80°32'6.6633"W	1764.25	72.231	6.83	4.14	9.45
6762.00	41.940	152.860	6257.79	203.40	488.46	1709.13	1770332.69	14581659.31	40°08'59.6460"N	80°32'6.2926"W	1777.56	74.050	7.00	5.38	7.04
6852.00	44.440	157.620	6323.42	264.91	432.54	1734.86	1770358.41	14581603.41	40°08'59.0921"N	80°32'5.9650"W	1787.97	76.000	4.56	2.78	5.29
6898.00	49.380	157.670	6354.84	298.49	401.48	1747.63	1770371.17	14581572.36	40°08'58.7845"N	80°32'5.8026"W	1793.15	77.062	10.74	10.74	0.11
6943.00	55.040	157.590	6382.40	334.04	368.60	1761.16	1770384.70	14581539.50	40°08'58.4590"N	80°32'5.6306"W	1799.32	78.179	12.58	12.58	-0.18
6988.00	61.210	158.340	6406.15	372.23	333.20	1775.48	1770399.01	14581504.11	40°08'58.1083"N	80°32'5.4486"W	1806.48	79.371	13.78	13.71	1.67
7033.00	66.960	159.110	6425.81	412.68	295.49	1790.16	1770413.68	14581466.42	40°08'57.7350"N	80°32'5.2622"W	1814.38	80.627	12.87	12.78	1.71
7079.00	71.930	157.920	6441.96	455.73	255.43	1805.93	1770429.45	14581426.37	40°08'57.3383"N	80°32'5.0617"W	1823.91	81.950	11.07	10.80	-2.59
7124.00	76.160	157.670	6454.33	498.99	215.38	1822.28	1770445.79	14581386.34	40°08'56.9417"N	80°32'4.8539"W	1834.97	83.259	9.42	9.40	-0.56
7169.00	80.720	157.330	6463.34	543.06	174.66	1839.15	1770462.66	14581345.64	40°08'56.5384"N	80°32'4.6394"W	1847.43	84.575	10.16	10.13	-0.76
7215.00	82.590	156.250	6470.02	588.57	132.84	1857.09	1770480.59	14581303.83	40°08'56.1242"N	80°32'4.4112"W	1861.83	85.909	4.68	4.07	-2.35
7260.00	83.890	156.850	6475.31	633.25	91.84	1874.87	1770498.36	14581262.85	40°08'55.7181"N	80°32'4.1850"W	1877.12	87.196	3.18	2.89	1.33
7305.00	85.560	156.440	6479.45	678.05	50.70	1892.63	1770516.12	14581221.72	40°08'55.3107"N	80°32'3.9590"W	1893.31	88.465	3.82	3.71	-0.91
7351.00	87.380	156.760	6482.28	723.96	8.57	1910.87	1770534.34	14581179.61	40°08'54.8934"N	80°32'3.7271"W	1910.89	89.743	4.02	3.96	0.70
7396.00	89.660	155.650	6483.45	768.93	-32.59	1929.02	1770552.49	14581138.46	40°08'54.4857"N	80°32'3.4962"W	1929.29	90.968	5.63	5.07	-2.47
7487.00	90.180	156.590	6483.57	859.90	-115.80	1965.85	1770589.31	14581055.29	40°08'53.6616"N	80°32'3.0274"W	1969.26	93.371	1.18	0.57	1.03
7577.00	89.880	158.040	6483.53	949.90	-198.83	2000.56	1770624.01	14580972.28	40°08'52.8392"N	80°32'2.5860"W	2010.42	96.676	1.65	-0.33	1.61
7668.00	88.950	157.020	6484.45	1040.89	-282.92	2035.34	1770658.77	14580888.23	40°08'52.0065"N	80°32'2.1439"W	2054.91	97.914	1.52	-1.02	-1.12
7759.00	89.480	156.560	6485.70	1131.87	-366.54	2071.20	1770694.62	14580804.64	40°08'51.1782"N	80°32'1.6878"W	2103.38	100.036	0.77	0.58	-0.51
7849.00	90.220	157.590	6485.94	1221.87	-449.43	2106.26	1770729.66	14580721.78	40°08'50.3573"N	80°32'1.2419"W	2153.67	102.045	1.41	0.82	1.14
7940.00	89.110	158.280	6486.47	1312.86	-533.76	2140.44	1770763.83	14580637.48	40°08'49.5222"N	80°32'0.8074"W	2205.99	104.002	1.44	-1.22	0.76
8031.00	89.050	156.480	6487.93	1403.85	-617.75	2175.43	1770798.81	14580553.53	40°08'48.6904"N	80°32'0.3625"W	2261.44	105.853	1.98	-0.07	-1.98
8121.00	89.910	156.130	6488.75	1493.82	-700.16	2211.60	1770834.96	14580471.15	40°08'47.8742"N	80°31'59.9024"W	2319.78	107.567	1.03	0.96	-0.39
8212.00	89.380	155.830	6489.31	1584.81	-784.23	2246.39	1770869.74	14580387.11	40°08'47.0416"N	80°31'59.4600"W	2379.35	109.245	3.11	-0.58	3.05
8303.00	89.380	155.910	6490.30	1675.80	-868.21	2281.40	1770904.74	14580303.16	40°08'46.2099"N	80°31'59.0149"W	2441.02	110.835	3.38	0.00	-3.38
8393.00	90.120	156.910	6490.69	1765.78	-950.66	2317.47	1770940.79	14580220.74	40°08'45.3932"N	80°31'58.5560"W	2504.88	112.304	1.45	0.82	1.20
8484.00	89.600	158.400	6490.91	1856.77	-1034.83	2352.07	1770975.38	14580136.61	40°08'44.5597"N	80°31'58.1162"W	2569.65	113.748	1.73	-0.57	1.64
8575.00	88.680	152.330	6492.28	1947.66	-1117.50	2389.98	1771013.27	14580053.97	40°08'43.7408"N	80°31'57.6336"W	2638.33	115.060	6.75	-1.01	-6.67

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# Actual Wellpath Report

Gary Kestner OHI 410H AWP Proj: 18232

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# Baker Hughes

Operator	SWN PRODUCTION COMPANY, LLC
Field	Ohio
Facility	Gary Kestner OHI Pad
Slot	Slot #410
	Gary Kestner OHI 410H AWB

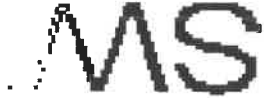
## WELLPATH DATA (227 stations)

MD	Inclination	Azimuth	TVD	Vert Sect	North	East	Grid East	Grid North	Latitude	Longitude	Closure Dist	Closure Dir	DLS	Build Rate	Turn Rate
[ft]	[°]	[°]	[ft]	[ft]	[ft]	[ft]	[US ft]	[US ft]			[ft]	[°]	[°/100ft]	[°/100ft]	[°/100ft]
8665.00	158.100	6494.69	2037.52	-1199.14	2427.68	1771050.96	1457992.36	40°08'42.9321"N	80°31'57.1537"W	2707.69	116.287	6.43	-0.48	6.41	-2.86
8756.00	155.500	6495.69	2128.49	-1282.77	2463.52	1771086.79	1457988.77	40°08'42.1238"N	80°31'56.6979"W	2777.48	117.506	3.77	2.46	-2.86	-2.40
8847.00	157.680	6496.82	2219.46	-1366.26	2499.67	1771157.23	1457980.51	40°08'41.2769"N	80°31'56.2380"W	2848.68	118.660	3.56	-2.64	2.40	-0.22
8937.00	157.480	6497.96	2309.45	-1449.44	2533.99	1771189.97	1457967.30	40°08'39.6125"N	80°31'55.8018"W	2919.24	119.770	2.64	3.12	-0.22	3.12
9028.00	160.320	6498.09	2400.41	-1534.33	2566.74	1771189.97	1457963.79	40°08'39.6125"N	80°31'55.3857"W	2990.37	120.870	3.34	-1.19	3.12	-4.29
9119.00	156.420	6498.75	2491.38	-1618.90	2600.28	1771223.49	1457952.76	40°08'38.7750"N	80°31'54.9596"W	3063.05	121.906	4.31	0.44	-4.29	1.44
9209.00	157.720	6499.04	2581.37	-1701.79	2635.34	1771258.54	1457946.90	40°08'37.9541"N	80°31'54.5138"W	3137.06	122.853	1.45	0.08	1.44	0.54
9300.00	158.210	6499.34	2672.37	-1786.14	2669.48	1771292.67	1457938.58	40°08'37.1188"N	80°31'54.0799"W	3211.92	123.786	0.54	-0.08	0.54	0.14
9391.00	158.340	6499.71	2763.36	-1870.68	2703.17	1771326.34	1457930.10	40°08'36.2817"N	80°31'53.6519"W	3287.33	124.684	0.15	-0.03	0.14	0.25
9481.00	158.390	6501.02	2853.34	-1954.33	2736.35	1771359.51	1457921.46	40°08'35.4533"N	80°31'53.2303"W	3362.59	125.535	1.30	-1.30	0.06	0.25
9572.00	158.620	6500.97	2944.31	-2038.99	2769.69	1771392.83	1457913.83	40°08'34.6150"N	80°31'52.8068"W	3439.28	126.360	3.20	3.19	0.25	-0.08
9663.00	158.550	6499.80	3035.29	-2123.70	2802.91	1771426.04	1457904.16	40°08'33.7761"N	80°31'52.3848"W	3516.59	127.150	1.63	-1.63	-0.08	-0.61
9753.00	158.000	6500.07	3125.28	-2207.30	2836.22	1771459.34	1457896.45	40°08'32.9482"N	80°31'51.9615"W	3593.93	127.892	0.72	-0.38	-0.61	0.76
9844.00	157.340	6498.91	3216.26	-2291.47	2870.79	1771493.90	1457888.04	40°08'32.1147"N	80°31'51.0752"W	3673.18	128.597	2.45	-0.72	0.76	0.13
9934.00	156.690	6498.59	3306.25	-2374.31	2905.93	1771529.03	1457871.35	40°08'31.2942"N	80°31'51.2942"W	3752.57	129.251	3.60	-3.52	0.13	0.13
10025.00	158.690	6498.32	3397.23	-2458.48	2940.47	1771563.55	1457871.35	40°08'30.4606"N	80°31'50.6362"W	3832.82	129.899	4.05	3.41	2.20	-0.59
10115.00	158.810	6497.11	3487.20	-2542.35	2973.08	1771596.16	1457862.96	40°08'29.6301"N	80°31'50.2220"W	3911.88	130.535	2.12	-2.11	0.13	0.13
10206.00	158.270	6497.14	3578.18	-2627.04	3006.38	1771629.43	1457854.00	40°08'28.7915"N	80°31'49.7991"W	3992.45	131.148	0.70	0.36	-0.59	0.13
10296.00	158.910	6497.09	3668.16	-2710.84	3039.20	1771662.25	1457846.12	40°08'27.9617"N	80°31'49.3821"W	4072.52	131.732	0.80	-0.27	0.13	0.13
10387.00	157.730	6496.80	3759.15	-2794.81	3074.25	1771697.29	1457837.30	40°08'27.1301"N	80°31'48.9365"W	4154.76	132.274	3.59	0.60	-3.54	0.13
10478.00	156.810	6496.43	3850.13	-2878.11	3110.87	1771733.89	1457829.43	40°08'26.3050"N	80°31'48.4706"W	4238.05	132.774	1.29	-0.51	1.19	0.13
10568.00	159.880	6496.53	3940.11	-2961.75	3144.08	1771767.09	14578210.43	40°08'25.4768"N	80°31'48.0488"W	4319.40	133.290	3.41	0.30	3.41	0.13
10659.00	156.470	6496.50	4031.09	-3046.21	3177.91	1771800.90	14578125.99	40°08'24.6403"N	80°31'47.6190"W	4402.10	133.788	3.76	0.30	-3.75	0.13
10749.00	158.820	6496.07	4121.08	-3129.44	3212.14	1771835.12	14578042.80	40°08'23.8161"N	80°31'47.1839"W	4484.56	134.253	2.63	0.28	2.61	0.13
10840.00	155.240	6496.14	4212.06	-3213.21	3247.64	1771870.61	14577959.06	40°08'22.9864"N	80°31'46.7325"W	4568.58	134.695	4.05	-0.98	-3.93	0.13
10931.00	159.500	6496.90	4303.04	-3297.19	3282.65	1771905.60	14577875.12	40°08'22.1548"N	80°31'46.2875"W	4652.66	135.127	4.68	0.03	4.68	0.13
11021.00	158.600	6497.57	4393.00	-3381.23	3314.83	1771937.77	14577791.10	40°08'21.3225"N	80°31'45.8789"W	4735.06	135.568	1.00	0.07	-1.00	0.13
11112.00	158.590	6499.25	4483.96	-3465.94	3348.03	1771970.96	14577706.43	40°08'20.4837"N	80°31'45.4571"W	4818.93	135.991	1.45	-1.45	-0.01	0.13
11202.00	158.710	6499.57	4573.93	-3549.75	3380.79	1772003.71	14577622.65	40°08'19.6538"N	80°31'45.0410"W	4902.09	136.397	3.38	3.38	0.13	-6.27
11293.00	153.000	6498.74	4664.85	-3632.75	3418.00	1772040.90	14577539.68	40°08'18.8316"N	80°31'44.5676"W	4987.95	136.745	6.52	-1.76	-6.27	-6.27

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# Actual Wellpath Report

Gary Kestner OHI 410H AWP Proj: 18232

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# Baker Hughes

Operator	SWN PRODUCTION COMPANY, LLC
Field	Ohio
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	Gary Kestner OHI 410H AWP
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	Gary Kestner OHI 410H
	Well

## WELLPATH DATA (227 stations)

MD	Inclination	Azimuth	TVD	Vert Sect	North	East	Grid East	Grid North	Latitude	Longitude	Closure Dist	Closure Dir	DLS	Build Rate	Turn Rate
11384.00	87.690	157.590	6500.80	4755.73	-3715.37	3456.01	1772078.90	14577457.09	40°08'18.0132"N	80°31'44.0838"W	5074.25	137.071	5.51	-2.23	5.04
11474.00	89.050	156.420	6503.36	4845.69	-3798.18	3491.16	1772114.03	14577290.76	40°08'17.1930"N	80°31'43.6370"W	5158.91	137.412	1.99	-1.51	-1.30
11565.00	88.860	157.050	6505.02	4936.67	-3881.77	3527.09	1772149.95	14577207.03	40°08'16.3651"N	80°31'43.1800"W	5244.86	137.741	0.72	-0.21	0.69
11656.00	90.560	156.950	6505.49	5027.66	-3965.53	3562.65	1772185.49	14577207.03	40°08'15.5355"N	80°31'42.7279"W	5330.84	138.063	1.86	-1.86	-0.11
11746.00	90.680	156.740	6504.52	5117.65	-4048.28	3598.04	1772220.87	14577124.31	40°08'14.7160"N	80°31'42.2780"W	5416.13	138.370	0.27	0.14	-0.23
11837.00	89.320	158.090	6504.52	5208.64	-4132.30	3632.98	1772255.80	14577040.33	40°08'13.8839"N	80°31'41.8338"W	5502.22	138.679	2.11	-1.49	1.48
11928.00	90.030	156.670	6505.04	5299.64	-4216.29	3667.98	1772290.79	14576956.36	40°08'13.0520"N	80°31'41.3889"W	5588.49	138.978	1.74	0.78	-1.56
12018.00	89.690	155.960	6505.26	5389.62	-4298.71	3704.13	1772326.92	14576873.98	40°08'12.2357"N	80°31'40.9290"W	5674.46	139.249	0.87	-0.38	-0.79
12109.00	90.950	156.270	6504.75	5480.59	-4381.91	3740.98	1772363.76	14576790.81	40°08'11.4115"N	80°31'40.4603"W	5761.60	139.512	1.43	1.38	0.34
12200.00	90.430	158.640	6503.65	5571.58	-4465.95	3775.86	1772398.63	14576706.80	40°08'10.5793"N	80°31'40.0169"W	5848.23	139.786	2.67	-0.57	2.60
12290.00	92.550	155.240	6501.31	5661.53	-4548.71	3811.10	1772433.85	14576624.07	40°08'9.7596"N	80°31'39.5690"W	5934.24	140.042	4.45	2.36	-3.78
12381.00	90.400	151.060	6498.97	5752.21	-4629.85	3852.17	1772474.91	14576542.96	40°08'8.9556"N	80°31'39.0457"W	6022.85	140.239	5.16	-2.36	-4.59
12472.00	89.540	157.800	6499.02	5843.03	-4711.89	3891.43	1772514.15	14576460.96	40°08'8.1428"N	80°31'38.5459"W	6111.06	140.448	7.47	-0.95	7.41
12563.00	92.180	156.190	6497.65	5934.00	-4795.63	3926.98	1772549.69	14576377.25	40°08'7.3134"N	80°31'38.0939"W	6198.33	140.687	3.40	2.90	-1.77
12653.00	90.090	158.340	6495.87	6023.97	-4878.61	3961.75	1772584.44	14576294.30	40°08'6.4916"N	80°31'37.6519"W	6284.61	140.921	3.33	-2.32	2.39
12744.00	91.290	155.960	6494.77	6114.96	-4962.46	3997.08	1772619.76	14576210.48	40°08'5.6612"N	80°31'37.2027"W	6372.02	141.150	2.93	1.32	-2.62
12834.00	88.310	158.350	6495.09	6204.94	-5045.38	4032.02	1772654.68	14576127.59	40°08'4.8399"N	80°31'36.7586"W	6458.57	141.370	4.24	-3.31	2.66
12925.00	90.520	161.890	6496.02	6295.82	-5130.94	4062.95	1772685.61	14576042.07	40°08'3.9928"N	80°31'36.3662"W	6544.78	141.626	4.59	2.43	3.89
13016.00	90.980	156.830	6494.82	6386.73	-5216.06	4095.02	1772717.66	14575956.98	40°08'3.1499"N	80°31'35.9592"W	6631.48	141.865	5.58	0.51	-5.56
13106.00	89.570	159.970	6494.39	6476.71	-5299.73	4128.14	1772750.77	14575873.34	40°08'2.3214"N	80°31'35.5385"W	6717.79	142.084	3.82	-1.57	3.49
13197.00	91.570	158.090	6493.49	6567.66	-5384.69	4160.71	1772783.32	14575788.42	40°08'1.4801"N	80°31'35.1251"W	6804.88	142.307	3.02	2.20	-2.07
13288.00	88.340	158.720	6493.56	6658.63	-5469.29	4194.19	1772816.80	14575703.85	40°08'0.6423"N	80°31'34.6998"W	6892.34	142.517	3.62	-3.55	0.69
13378.00	90.550	160.920	6494.43	6748.54	-5553.75	4225.24	1772847.83	14575619.42	40°07'59.8060"N	80°31'34.3059"W	6978.31	142.737	3.46	2.46	-5.97
13469.00	89.970	155.490	6494.02	6839.50	-5638.21	4259.01	1772881.59	14575534.99	40°07'58.9696"N	80°31'33.8769"W	7066.02	142.933	6.00	-0.64	-2.49
13560.00	87.780	157.730	6495.78	6929.46	-5720.79	4294.73	1772917.29	14575452.44	40°07'58.1517"N	80°31'33.4227"W	7153.47	143.104	3.48	-2.43	2.49
13650.00	89.660	162.120	6497.82	7020.33	-5806.22	4325.95	1772948.50	14575367.05	40°07'57.3059"N	80°31'33.0267"W	7240.58	143.312	5.25	2.07	4.82
13741.00	93.020	159.110	6495.69	7111.15	-5892.01	4356.13	1772978.67	14575281.29	40°07'56.4565"N	80°31'32.6439"W	7327.46	143.523	4.96	3.69	-3.31
13832.00	91.290	155.730	6492.27	7202.06	-5975.96	4391.04	1773013.57	14575197.37	40°07'55.6250"N	80°31'32.2002"W	7415.75	143.692	4.17	-1.90	-3.71
13922.00	90.280	158.570	6491.03	7292.04	-6058.88	4425.98	1773048.50	14575114.48	40°07'54.8038"N	80°31'31.7561"W	7503.29	143.852	3.35	-1.12	3.16
14013.00	89.880	157.840	6490.91	7383.04	-6143.40	4459.70	1773082.20	14575029.99	40°07'53.9668"N	80°31'31.3279"W	7591.46	144.023	0.82	-0.44	-0.69

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# Actual Wellpath Report

Gary Kestner OHI 410H AWP Proj: 18232



Operator	SWN PRODUCTION COMPANY, LLC
Field	Ohio
Facility	Gary Kestner OHI Pad
Slot	Slot #410
	Gary Kestner OHI 410H AWP
	Wellbore
	AP/LEGAL
	Gary Kestner OHI 410H
	Well

## WELLPATH DATA (227 stations)

MD	Inclination	Azimuth	TVD	Vert Sect	North	East	Grid East	Grid North	Latitude	Longitude	Closure Dist	Closure Dir	DLS	Build Rate	Turn Rate
[ft]	[°]	[°]	[ft]	[ft]	[ft]	[ft]	[US ft]	[US ft]			[ft]	[°]	[°/100ft]	[°/100ft]	[°/100ft]
14103.00	89.850	6491.12	7473.03	-6227.03	4492.97	1773115.46	14574946.40	40°07'53.1386"N	80°31'30.9053"W	7678.71	144.189	0.81	-0.03	0.81	0.81
14194.00	90.490	6490.85	7564.01	-6311.67	4526.38	1773148.85	14574861.79	40°07'52.3004"N	80°31'30.4810"W	7766.94	144.354	0.84	0.70	-0.46	0.70
14285.00	90.430	6490.12	7655.00	-6396.15	4660.20	1773182.66	14574777.34	40°07'51.4638"N	80°31'30.0513"W	7855.33	144.513	0.17	-0.07	-0.15	0.49
14376.00	90.060	6489.73	7745.99	-6480.72	4593.80	1773216.25	14574692.80	40°07'50.6263"N	80°31'29.6247"W	7943.72	144.669	0.64	-0.41	0.49	0.49
14466.00	90.550	6489.25	7835.98	-6564.38	4626.96	1773249.40	14574609.17	40°07'49.7978"N	80°31'29.2034"W	8031.18	144.822	0.68	0.54	-0.41	0.54
14557.00	90.060	6488.77	7926.95	-6649.20	4659.93	1773282.35	14574524.39	40°07'48.9579"N	80°31'28.7849"W	8119.53	144.976	1.36	-0.54	1.25	-0.41
14648.00	88.770	6489.69	8017.93	-6733.60	4693.92	1773316.33	14574440.02	40°07'48.1221"N	80°31'28.3531"W	8208.18	145.120	3.12	-1.42	-2.78	-1.42
14739.00	90.490	6490.28	8108.93	-6817.64	4728.81	1773351.21	14574356.02	40°07'47.2898"N	80°31'27.9097"W	8297.10	145.254	2.37	1.89	1.43	1.89
14829.00	89.780	6490.07	8198.92	-6900.59	4763.71	1773386.10	14574273.10	40°07'46.4683"N	80°31'27.4660"W	8385.17	145.381	2.19	-0.79	-2.04	-0.79
14920.00	89.660	6490.51	8289.89	-6983.80	4800.53	1773422.90	14574189.91	40°07'45.6440"N	80°31'26.9978"W	8474.59	145.496	0.30	-0.13	-0.27	-0.13
15010.00	90.150	6490.66	8379.85	-7065.88	4837.45	1773459.81	14574107.87	40°07'44.8309"N	80°31'26.5282"W	8563.16	145.604	0.75	0.54	-0.51	0.54
15101.00	89.510	6490.93	8470.81	-7148.83	4874.89	1773497.23	14574024.95	40°07'44.0093"N	80°31'26.0520"W	8652.76	145.709	0.79	-0.70	0.35	-0.70
15192.00	88.490	6492.52	8561.77	-7232.01	4911.75	1773534.08	14573941.80	40°07'43.1853"N	80°31'25.5832"W	8742.27	145.817	1.23	-1.12	0.51	-1.12
15282.00	88.150	6495.16	8651.70	-7314.20	4948.32	1773570.64	14573859.64	40°07'42.3712"N	80°31'25.1180"W	8830.82	145.920	0.80	-0.38	-0.71	-0.38
15373.00	89.570	6496.97	8742.66	-7397.74	4984.35	1773606.65	14573776.14	40°07'41.5438"N	80°31'24.6599"W	8920.22	146.029	2.66	1.56	2.15	1.56
15464.00	88.980	6498.12	8833.65	-7481.44	5020.02	1773642.31	14573692.46	40°07'40.7147"N	80°31'24.2065"W	9009.58	146.139	1.73	-0.65	-1.60	-0.65
15555.00	89.320	6499.47	8924.62	-7564.77	5056.57	1773678.84	14573609.17	40°07'39.8894"N	80°31'23.7417"W	9099.16	146.240	0.46	0.37	0.27	0.37
15645.00	89.230	6500.61	9014.59	-7647.12	5092.86	1773715.12	14573526.85	40°07'39.0736"N	80°31'23.2803"W	9187.80	146.337	0.50	-0.10	-0.49	-0.10
15736.00	90.890	6500.52	9105.58	-7730.68	5128.89	1773751.13	14573443.32	40°07'38.2460"N	80°31'22.8222"W	9277.33	146.438	2.35	1.82	1.48	1.82
15826.00	88.740	6500.81	9195.57	-7813.48	5164.15	1773786.38	14573360.56	40°07'37.4259"N	80°31'22.3741"W	9365.83	146.538	2.56	-2.39	-0.92	-2.39
15917.00	90.770	6501.20	9286.56	-7897.32	5199.51	1773821.73	14573276.75	40°07'36.5955"N	80°31'21.9246"W	9455.29	146.640	2.60	2.23	1.34	2.23
16008.00	89.230	6501.20	9377.51	-7980.40	5236.58	1773858.78	14573193.69	40°07'35.7725"N	80°31'21.4531"W	9545.08	146.728	4.27	-1.69	-3.92	-1.69
16098.00	90.030	6501.78	9467.39	-8061.71	5275.16	1773897.35	14573112.42	40°07'34.9670"N	80°31'20.9621"W	9634.24	146.801	1.33	0.89	0.99	0.89
16189.00	89.750	6501.91	9558.37	-8145.28	5311.14	1773933.32	14573028.88	40°07'34.1392"N	80°31'20.5046"W	9723.88	146.894	3.63	-0.31	3.62	-0.31
16280.00	90.550	6501.71	9649.35	-8229.99	5344.40	1773966.56	14572944.21	40°07'33.3004"N	80°31'20.0824"W	9813.02	147.001	1.00	0.88	0.47	0.88
16370.00	90.150	6501.16	9739.33	-8313.81	5377.17	1773999.99	14572860.42	40°07'32.4704"N	80°31'19.6663"W	9901.18	147.106	0.54	-0.44	-0.30	-0.44
16461.00	89.600	6501.36	9830.33	-8398.10	5411.44	1774033.58	14572776.16	40°07'31.6356"N	80°31'19.2310"W	9990.59	147.204	1.52	-1.40	-1.58	1.52
16552.00	90.520	6501.27	9921.32	-8482.45	5445.59	1774067.71	14572691.84	40°07'30.8002"N	80°31'18.7972"W	10080.00	147.300	1.88	1.01	1.58	1.88
16642.00	89.780	6501.03	10011.30	-8566.29	5478.31	1774100.42	14572608.03	40°07'29.9700"N	80°31'18.3818"W	10168.25	147.400	0.82	-0.82	0.00	-0.82
16733.00	90.090	6501.13	10102.27	-8651.16	5511.14	1774133.24	14572523.19	40°07'29.1295"N	80°31'17.9651"W	10257.45	147.501	0.51	0.34	0.38	0.34

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**Actual Wellpath Report**  
 Gary Kestner OHI 410H AWP Proj: 18232  
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**Baker Hughes**

Operator	SWN PRODUCTION COMPANY, LLC
Field	Ohio
Facility	Gary Kestner OHI Pad
Wellbore	Gary Kestner OHI 410H AWB
AP/ Legal	
Well	Gary Kestner OHI 410H
Slot	Slot #410

WELLPATH DATA (227 stations) † = interpolated, ‡ = extrapolated station															
MD	Inclination	Azimuth	TVD	Vert Sect	North	East	Grid East	Grid North	Latitude	Longitude	Closure Dist	Closure Dir	DLS	Build Rate	Turn Rate
(ft)	(°)	(°)	(ft)	(ft)	(ft)	(ft)	(US ft)	(US ft)			(ft)	(°)	(°/100ft)	(°/100ft)	(°/100ft)
16824.00	89.780	158.710	6501.24	10193.25	-8736.04	5543.94	1774166.03	14572438.34	40°07'28.2890"N	80°31'17.5487"W	10346.68	147.601	0.49	-0.34	-0.35
17005.00	90.180	157.690	6501.27	10374.23	-8904.13	5611.08	1774233.14	14572270.32	40°07'26.6244"N	80°31'16.6962"W	10435.07	147.782	0.66	0.20	-0.63
17096.00	90.090	158.790	6501.05	10465.22	-8988.64	5644.81	1774266.86	14572185.84	40°07'25.7874"N	80°31'16.2678"W	10614.12	147.871	1.21	-0.10	1.21
17186.00	89.750	158.190	6501.18	10555.20	-9072.38	5677.81	1774299.84	14572102.14	40°07'24.9583"N	80°31'15.8488"W	10702.59	147.960	0.77	-0.38	-0.67
17277.00	89.630	159.650	6501.67	10646.17	-9157.28	5710.54	1774332.56	14572017.27	40°07'24.1175"N	80°31'15.4334"W	10791.94	148.052	1.61	-0.13	1.60
17367.00	89.510	156.490	6502.35	10736.15	-9240.76	5744.15	1774366.15	14571933.82	40°07'23.2908"N	80°31'15.0066"W	10880.57	148.135	3.51	-0.13	-3.51
17458.00	90.310	161.100	6502.49	10827.10	-9325.57	5777.05	1774399.05	14571849.04	40°07'22.4509"N	80°31'14.5889"W	10969.99	148.222	5.14	0.88	5.07
17549.00	89.630	157.780	6502.54	10918.04	-9410.76	5809.01	1774430.99	14571763.88	40°07'21.6073"N	80°31'14.1835"W	11059.25	148.314	3.72	-0.75	-3.65
17639.00	89.970	158.030	6502.85	11008.03	-9494.15	5842.86	1774464.83	14571680.53	40°07'20.7815"N	80°31'13.7535"W	11148.00	148.391	0.47	0.38	0.28
17730.00	89.910	158.390	6502.95	11099.03	-9578.65	5876.64	1774498.60	14571596.06	40°07'19.9447"N	80°31'13.3245"W	11237.68	148.470	0.40	-0.07	0.40
17821.00	89.880	158.670	6503.11	11190.01	-9663.34	5909.94	1774531.89	14571511.41	40°07'19.1060"N	80°31'12.9017"W	11327.29	148.551	0.31	-0.03	0.31
17911.00	89.480	158.170	6503.62	11280.00	-9747.03	5943.05	1774564.98	14571427.75	40°07'18.2773"N	80°31'12.4814"W	11415.97	148.628	0.71	-0.44	-0.56
18002.00	89.880	157.810	6504.13	11370.99	-9831.39	5977.15	1774599.07	14571343.42	40°07'17.4417"N	80°31'12.0482"W	11505.76	148.702	0.59	0.44	-0.40
18092.00	90.340	157.110	6503.95	11460.99	-9914.52	6011.65	1774633.55	14571260.32	40°07'16.6185"N	80°31'11.6099"W	11594.72	148.770	0.93	0.51	-0.78
18183.00	90.280	157.020	6503.46	11551.99	-9998.32	6047.11	1774669.00	14571176.55	40°07'15.7884"N	80°31'11.1593"W	11684.77	148.834	0.12	-0.07	-0.10
18232.00	90.280	157.020	6503.22	11600.98	-10043.43	6066.24	1774688.12	14571131.46	40°07'15.3416"N	80°31'10.9162"W	11733.28	148.868	0.00	0.00	0.00

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# Actual Wellpath Report

Gary Kestner OHI 410H AWP Proj: 18232



Operator	SWN PRODUCTION COMPANY, LLC
Field	Ohio
Facility	Gary Kestner OHI Pad
Slot	Slot #410
Well	Gary Kestner OHI 410H
API/Legal	
Wellbore	Gary Kestner OHI 410H AWB

HOLE & CASING SECTIONS - Ref Wellbore: Gary Kestner OHI 410H AWB Ref Wellpath: Gary Kestner OHI 410H AWP Proj: 18232									
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]
20in Conductor	26.00	100.00	74.00	26.00	100.00	0.00	0.00	-0.02	0.27
17.5in Open Hole	100.00	755.00	655.00	100.00	754.91	-0.02	0.27	-5.57	7.59
13.375in Casing Surface	26.00	678.00	652.00	26.00	677.93	0.00	0.00	-4.02	6.74
12.25in Open Hole	755.00	2070.00	1315.00	754.91	2067.42	-5.57	7.59	52.87	27.38
9.625in Casing Intermediate	26.00	2047.00	2021.00	26.00	2044.42	0.00	0.00	53.02	27.25
8.75in Open Hole	2047.00	5855.00	3808.00	2044.42	5495.32	53.02	27.25	595.86	1302.86
8.5in Open Hole	5855.00	18232.00	12377.00	5495.32	6503.22	595.86	1302.86	-10043.43	6066.24
5.5in Casing Production	26.00	18232.00	18206.00	26.00	6503.22	0.00	0.00	-10043.43	6066.24

TARGETS									
Name	TVD [ft]	North [ft]	East [ft]	Grid East [us ft]	Grid North [us ft]	Latitude	Longitude	Shape	
Gary Kestner OHI 410H LP Rev-4	6486.00	45.84	1896.87	1770520.35	14581216.86	40°08'55.2624"N	80°32'3.9048"W	point	
Gary Kestner OHI 410H BHL Rev-4	6676.50	-10039.80	6078.67	1774700.55	14571135.09	40°07'15.3769"N	80°31'10.7559"W	point	
Gary Kestner SE Unit	6999.20	-7366.81	3276.50	1771899.46	14573807.05	40°07'41.9392"N	80°31'46.6439"W	polygon	2D Polygon: dimensions not calculated
Gary Kestner SW Unit	6999.20	-7366.81	3276.50	1771899.46	14573807.05	40°07'41.9392"N	80°31'46.6439"W	polygon	2D Polygon: dimensions not calculated

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**Actual Wellpath Report**  
 Gary Kestner OHI 410H AWP Proj: 18232  
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**Baker Hughes**

Operator	SWN PRODUCTION COMPANY, LLC	Well	Gary Kestner OHI 410H
Field	Ohio	API/Legal	
Facility	Gary Kestner OHI Pad	Wellbore	Gary Kestner OHI 410H AWB
Slot	Slot #410		

<b>WELLPATH COMPOSITION - Ref Wellbore: Gary Kestner OHI 410H AWB Ref Wellpath: Gary Kestner OHI 410H AWP Proj: 18232</b>			
Start MD	End MD	Positional Uncertainty Model	Log Name/Comment
(ft)	(ft)		Wellbore
26.00	660.00	SDI Keeper v1.04	01 Scientific Drilling Gyro <17 1/2"> (100'-660')
660.00	2000.00	OWSG MWD rev2 + HRGM	02 Premier MWD <12-1/4"> (660')(788'-2000')
2000.00	5789.00	OWSG MWD rev2 + HRGM	03 Premier MWD Surveys <8-3/4"> (2000')(2073'-5789')
2000.00	5789.00	BH AutoTrak Curve (2019) (Short spacing)	04 BH AT Curve <8-1/2"> (5789')(5856'-18183')
5789.00	18232.00		Gary Kestner OHI 410H AWB
			1/26/2020

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**Wellpath general comments**  
 API: 47-069-00306-0000  
 BH Job #: 110199699A  
 Rig: SDC 41  
 Duration: 01/26/2020 - 01/30/2020

**COMMENTS**

Operator	SWN PRODUCTION COMPANY, LLC	Well	Gary Kestner OHI 410H
Field	Ohio	API/Legal	
Facility	Gary Kestner OHI Pad	Wellbore	Gary Kestner OHI 410H AWB
Slot	Slot #410		

