

NOBLE ENERGY

Location: Tyler County, WV
Field: Tyler
Facility: SHR-40 Pad

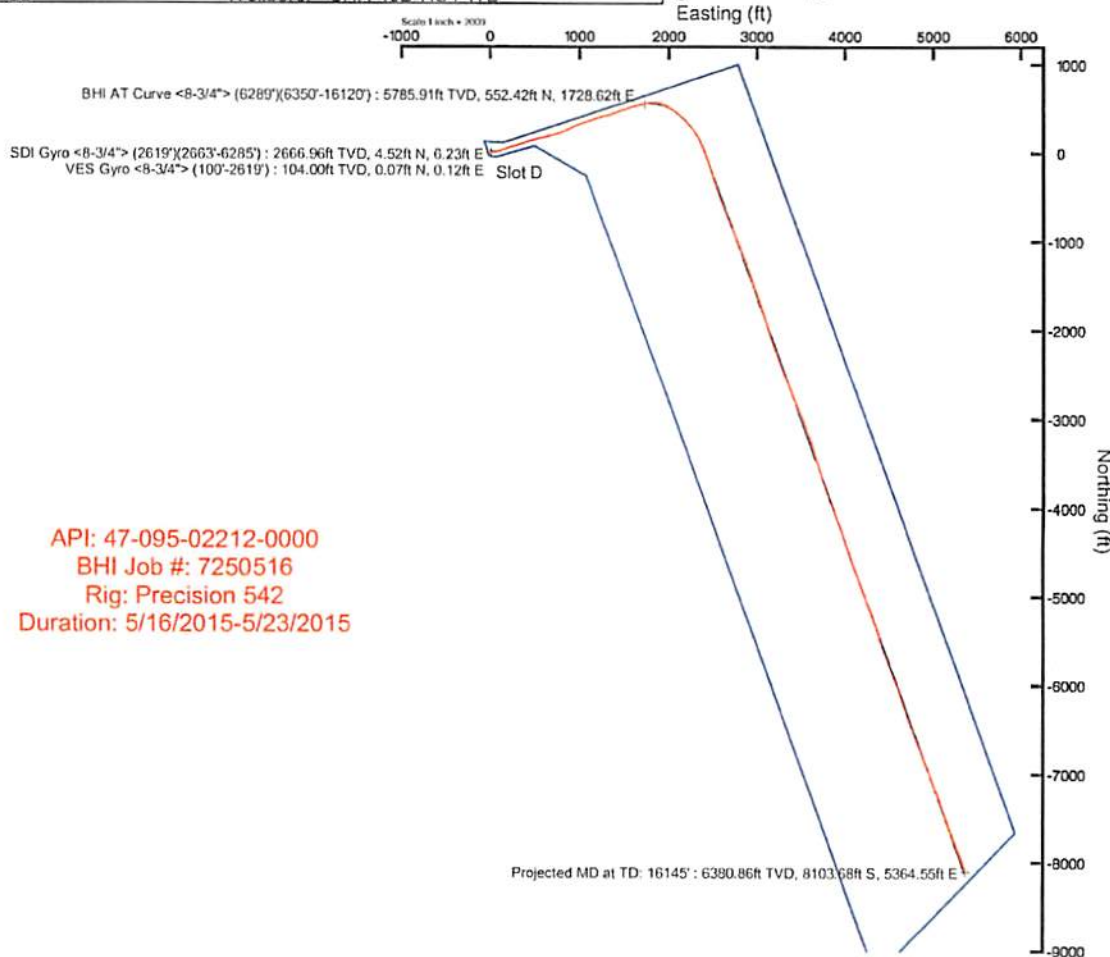
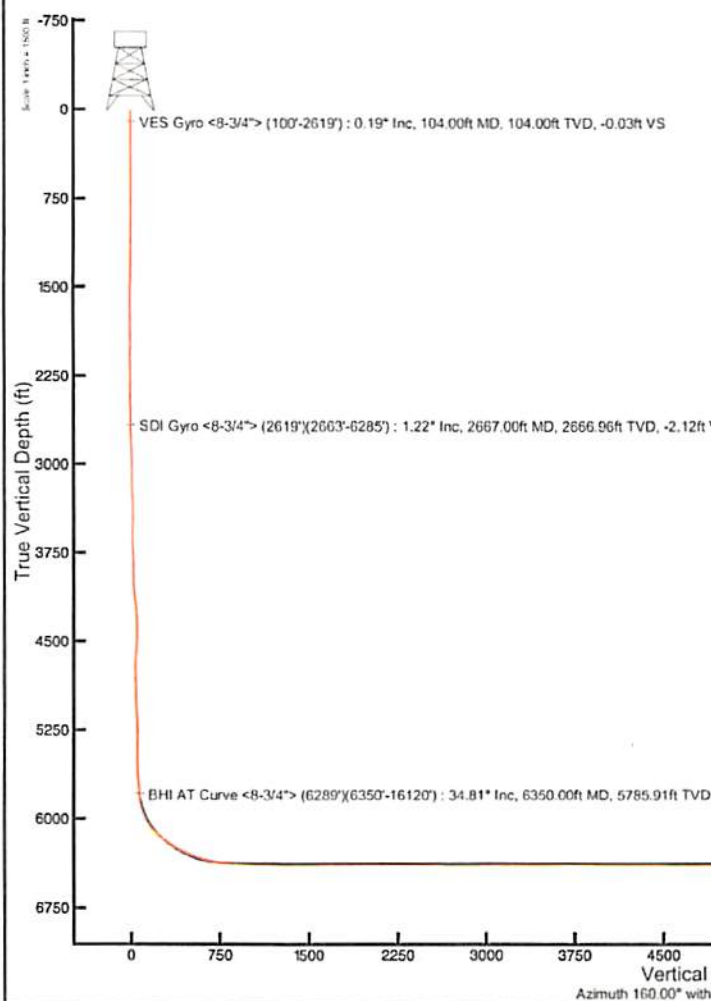
Slot: Slot D
Well: SHR-40D-HS
Wellbore: SHR-40D-HS PWB

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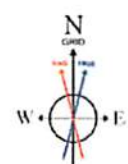


USGS reference wellpath is SHR-40D-HS PWB Slot D	
True vertical depths are referenced to Precision 542 (PSB)	Grid System: NAD22 / Latest West Virginia SP, NAD83 Zone 18N US feet
Measured depths are referenced to Precision 542 (PSB)	North Reference: Grid north
Precision 542 (PSB) to Mean Sea Level: 788.96 feet	Scale: True distance
Mean Sea Level to Mud line (At Slot D): -709.66 feet	Depths are in feet
Coordinates are in feet referenced to S84	Created by: rebarcor on 22May2015

Location Information						
Facility Name	Grid East (US ft)	Grid North (US ft)	Latitude	Longitude		
SHR-40 Pad	1622022.589	336042.458	39°24'53.800"N	80°50'04.876"W		
Slot	Local N (ft)	Local E (ft)	Grid East (US ft)	Grid North (US ft)	Latitude	Longitude
Slot D	-50.70	-31.31	1622091.280	335991.760	39°24'53.294"N	80°50'05.289"W
Precision 542 (RKB) to Mud line (At Slot D)				19.4ft		
Mean Sea Level to Mud line (At Slot D)				-769.56ft		
Precision 542 (RKB) to Mean Sea Level				788.96ft		



API: 47-095-02212-0000
BHI Job #: 7250516
Rig: Precision 542
Duration: 5/16/2015-5/23/2015



User specified (HDGM) Dip: 06.93° Field: 52421 nT
Magnetic North is 7.38 degrees West of True North (at 08/May/2015)
Grid North is 0.85 degrees West of True North
To correct azimuth from True to Grid add 0.85 degrees
To correct azimuth from Magnetic to Grid subtract 6.53 degrees

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ACTUAL WELLPATH REPORT (CSV version)

Prepared by Baker Hughes
Software System: WellArchitect® 4.0.1

REFERENCE WELLPATH IDENTIFICATION

Operator NOBLE ENERGY
Area Tyler County, WV
Field Tyler
Facility SHR-40 Pad
Slot Slot D
Well SHR-40D-HS
Wellbore SHR-40D-HS AWB
Wellpath SHR-40D-HS AWP Proj: 16145'
Sidetrack (none)

REPORT SETUP INFORMATION

Projection NAD27 / Lambert West Virginia SP, Northern Zone (4701), US feet
North Refe Grid
Scale 0.999948
Convergen 0.85° West
Software S WellArchitect® 4.0.1
User Edsaryar
Report Ger 22/May/2015 at 10:46
DataBase:/WellArchitectEasternDB/ev2021.xml

WELLPATH	Local North [ft]	Local East [ft]	Easting [US ft]	Northing [US ft]	Latitude	Longitude
Slot Locat	-50.7	-31.31	1622891	335991.8	39°24'53.2"	80°50'05.259"W
Facility Ref			1622923	336042.5	39°24'53.8"	80°50'04.870"W
Field Refer			609601.2	0	38°23'48.7"	84°21'09.765"W

WELLPATH DATUM

Calculation Minimum curvature
Horizontal Slot
Vertical Re Precision 542 (RKB)
MD Refere Precision 542 (RKB)
Field Vertic Mean Sea Level
Precision 5 788.96ft
Precision 5 788.96ft
Precision 5 19.40ft
Section Ori N 0.00, E 0.00 ft
Section Azi 160.00°

WELLPATH DATA † = 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 Dis [ft]	Closure Dir [°]	DLS ["/100ft]	Build Rate ["/100ft]	Turn Rate ["/100ft]
†	0	0	59.4	0	0	0	0	1622891	335991.8	39°24'53.2"	80°50'05.2"	0	0	0	0	0
SHL	19.4	0	59.4	19.4	0	0	0	1622891	335991.8	39°24'53.2"	80°50'05.2"	0	0	0	0	0
	104	0.19	59.4	104	-0.03	0.07	0.12	1622891	335991.8	39°24'53.2"	80°50'05.2"	0.14	59.4	0.22	0.22	0
	204	0.16	64.26	204	-0.07	0.22	0.39	1622892	335992	39°24'53.2"	80°50'05.2"	0.45	60.922	0.03	-0.03	4.86
	304	0.14	89.95	304	-0.04	0.28	0.64	1622892	335992	39°24'53.2"	80°50'05.2"	0.69	66.489	0.07	-0.02	25.69
	404	0.2	106.09	404	0.1	0.23	0.93	1622892	335992	39°24'53.2"	80°50'05.2"	0.95	76.129	0.08	0.06	16.14
	504	0.2	110.83	504	0.32	0.12	1.26	1622893	335991.9	39°24'53.2"	80°50'05.2"	1.26	84.619	0.02	0	4.74
	604	0.26	106.83	604	0.57	-0.01	1.64	1622893	335991.8	39°24'53.2"	80°50'05.2"	1.64	90.324	0.05	0.06	-4

704	0.15	102.02	704	0.77	-0.1	1.98	1622893	335991.7	39°24'53.2	80°50'05.2	1.99	92.95	0.11	-0.11	-4.81
804	0.36	103.98	804	1.02	-0.21	2.42	1622894	335991.6	39°24'53.2	80°50'05.2	2.42	94.858	0.21	0.21	1.96
904	0.31	88.56	903.99	1.28	-0.27	2.99	1622894	335991.5	39°24'53.2	80°50'05.2	3	95.242	0.1	-0.05	-15.42
1004	0.32	79.5	1003.99	1.41	-0.22	3.54	1622895	335991.5	39°24'53.2	80°50'05.2	3.54	93.508	0.05	0.01	-9.06
1104	0.34	44.29	1103.99	1.33	0.05	4.02	1622895	335991.8	39°24'53.2	80°50'05.2	4.02	89.337	0.2	0.02	-35.21
1204	0.35	23.11	1203.99	0.98	0.54	4.35	1622896	335992.3	39°24'53.3	80°50'05.2	4.38	82.919	0.13	0.01	-21.18
1304	0.45	6.45	1303.99	0.4	1.21	4.51	1622896	335993	39°24'53.3	80°50'05.2	4.67	74.969	0.15	0.1	-16.66
1404	0.35	11.27	1403.98	-0.21	1.9	4.61	1622896	335993.7	39°24'53.3	80°50'05.2	4.99	67.608	0.11	-0.1	4.82
1504	0.42	18.27	1503.98	-0.76	2.55	4.79	1622896	335994.3	39°24'53.3	80°50'05.1	5.42	61.976	0.08	0.07	7
1604	0.42	16.37	1603.98	-1.34	3.25	5.01	1622896	335995	39°24'53.3	80°50'05.1	5.97	57.024	0.01	0	-1.9
1704	0.32	19.18	1703.98	-1.85	3.86	5.2	1622896	335995.6	39°24'53.3	80°50'05.1	6.48	53.395	0.1	-0.1	2.81
1804	0.28	23.71	1803.98	-2.24	4.35	5.39	1622897	335996.1	39°24'53.3	80°50'05.1	6.93	51.095	0.05	-0.04	4.53
1904	0.31	15.58	1903.97	-2.64	4.84	5.56	1622897	335996.6	39°24'53.3	80°50'05.1	7.37	48.999	0.05	0.03	-8.13
2004	0.35	10.27	2003.97	-3.13	5.4	5.69	1622897	335997.2	39°24'53.3	80°50'05.1	7.84	46.513	0.05	0.04	-5.31
2104	0.2	12.57	2103.97	-3.54	5.87	5.78	1622897	335997.6	39°24'53.3	80°50'05.1	8.24	44.579	0.15	-0.15	2.3
2204	0.07	16.84	2203.97	-3.73	6.1	5.84	1622897	335997.9	39°24'53.3	80°50'05.1	8.44	43.758	0.13	-0.13	4.27
2304	0	35.08	2303.97	-3.78	6.15	5.85	1622897	335997.9	39°24'53.3	80°50'05.1	8.49	43.571	0.07	-0.07	0
2404	0.15	179.3	2403.97	-3.66	6.02	5.86	1622897	335997.8	39°24'53.3	80°50'05.1	8.4	44.194	0.15	0.15	0
2504	0.3	185.34	2503.97	-3.3	5.63	5.83	1622897	335997.4	39°24'53.3	80°50'05.1	8.11	46.008	0.15	0.15	6.04
2589	0.32	187.1	2588.97	-2.88	5.17	5.78	1622897	335996.9	39°24'53.3	80°50'05.1	7.76	48.18	0.03	0.02	2.07
2623	0.47	170.07	2622.97	-2.66	4.94	5.8	1622897	335996.7	39°24'53.3	80°50'05.1	7.62	49.539	0.56	0.44	-50.09
2667	1.22	120.9	2666.96	-2.12	4.52	6.23	1622898	335996.3	39°24'53.3	80°50'05.1	7.7	54.004	2.23	1.7	-111.75
2712	2.74	109.63	2711.94	-1.06	3.92	7.65	1622899	335995.7	39°24'53.3	80°50'05.1	8.6	62.893	3.47	3.38	-25.04
2756	4.08	100.96	2755.86	0.41	3.27	10.18	1622901	335995	39°24'53.3	80°50'05.1	10.69	72.21	3.25	3.05	-19.7
2800	5.27	91.34	2799.71	1.95	2.92	13.74	1622905	335994.7	39°24'53.3	80°50'05.0	14.04	77.993	3.23	2.7	-21.86
2844	6.66	87.95	2843.47	3.47	2.97	18.31	1622910	335994.7	39°24'53.3	80°50'05.0	18.55	80.798	3.26	3.16	-7.7
2888	7.75	85.51	2887.12	5.05	3.29	23.82	1622915	335995.1	39°24'53.3	80°50'04.9	24.04	82.136	2.57	2.48	-5.55
2932	8.17	83.86	2930.7	6.6	3.86	29.88	1622921	335995.6	39°24'53.3	80°50'04.8	30.13	82.647	1.09	0.95	-3.75
2977	8.23	81.3	2975.24	7.99	4.69	36.24	1622928	335996.4	39°24'53.3	80°50'04.7	36.55	82.634	0.82	0.13	-5.69
3021	8.07	77.98	3018.8	9.04	5.8	42.38	1622934	335997.6	39°24'53.3	80°50'04.7	42.77	82.201	1.13	-0.36	-7.55
3065	7.88	73.29	3062.37	9.64	7.32	48.29	1622940	335999.1	39°24'53.3	80°50'04.6	48.84	81.386	1.54	-0.43	-10.66
3109	8.65	71.93	3105.91	9.93	9.21	54.32	1622946	336001	39°24'53.3	80°50'04.5	55.1	80.379	1.81	1.75	-3.09
3153	10.09	73.33	3149.32	10.26	11.34	61.16	1622952	336003.1	39°24'53.4	80°50'04.4	62.2	79.495	3.31	3.27	3.18
3198	11.87	76.76	3193.5	11.04	13.53	69.44	1622961	336005.3	39°24'53.4	80°50'04.3	70.75	78.973	4.21	3.96	7.62
3242	13.6	81.12	3236.42	12.57	15.37	78.96	1622970	336007.1	39°24'53.4	80°50'04.2	80.44	78.987	4.5	3.93	9.91
3286	15.26	83.1	3279.03	14.88	16.86	89.82	1622981	336008.6	39°24'53.4	80°50'04.1	91.39	79.368	3.94	3.77	4.5
3330	16.69	79.22	3321.33	17.2	18.74	101.78	1622993	336010.5	39°24'53.4	80°50'03.9	103.49	79.568	4.05	3.25	-8.82
3374	17.64	74.29	3363.37	18.71	21.73	114.4	1623006	336013.5	39°24'53.5	80°50'03.8	116.45	79.247	3.95	2.16	-11.2
3419	18.47	68.82	3406.16	19.08	26.15	127.61	1623019	336017.9	39°24'53.5	80°50'03.6	130.26	78.42	4.19	1.84	-12.16
3463	19.03	65.41	3447.82	18.36	31.65	140.64	1623032	336023.4	39°24'53.6	80°50'03.4	144.15	77.316	2.8	1.27	-7.75
3507	20.4	65.4	3489.24	17.17	37.83	154.13	1623045	336029.6	39°24'53.6	80°50'03.3	158.71	76.21	3.11	3.11	-0.02
3551	21.95	66.96	3530.27	16.12	44.24	168.67	1623060	336036	39°24'53.7	80°50'03.1	174.38	75.303	3.75	3.52	3.55
3595	23.82	69.11	3570.81	15.54	50.63	184.54	1623076	336042.4	39°24'53.8	80°50'02.9	191.36	74.659	4.65	4.25	4.89
3639	25.13	70.1	3610.85	15.42	56.98	201.63	1623093	336048.7	39°24'53.8	80°50'02.7	209.53	74.221	3.12	2.98	2.25
3684	26.93	72.14	3651.29	15.82	63.35	220.32	1623112	336055.1	39°24'53.9	80°50'02.4	229.24	73.957	4.47	4	4.53
3728	28.51	75.61	3690.24	17.22	69.02	239.97	1623131	336060.8	39°24'54.0	80°50'02.2	249.7	73.954	5.13	3.59	7.89
3772	30.29	77.2	3728.57	19.64	74.09	260.97	1623152	336065.8	39°24'54.0	80°50'01.9	271.28	74.151	4.42	4.05	3.61
3816	32.06	75.16	3766.22	22.08	79.54	283.08	1623174	336071.3	39°24'54.1	80°50'01.6	294.04	74.306	4.68	4.02	-4.64
3860	33.31	72.64	3803.25	23.68	86.14	305.9	1623197	336077.9	39°24'54.1	80°50'01.3	317.8	74.274	4.2	2.84	-5.73
3904	34.17	70.4	3839.84	24.33	93.89	329.07	1623220	336085.6	39°24'54.2	80°50'01.0	342.2	74.076	3.44	1.95	-5.09
3948	35.31	69.42	3876	24.28	102.5	352.62	1623244	336094.3	39°24'54.3	80°50'00.7	367.21	73.792	2.89	2.59	-2.23
3993	36.98	70.24	3912.33	24.21	111.65	377.53	1623269	336103.4	39°24'54.4	80°50'00.4	393.7	73.525	3.86	3.71	1.82
4037	38.33	71.22	3947.17	24.55	120.52	402.91	1623294	336112.3	39°24'54.5	80°50'00.1	420.54	73.347	3.36	3.07	2.23
4081	39.95	71.31	3981.29	25.17	129.44	429.21	1623320	336121.2	39°24'54.6	80°49'59.8	448.3	73.218	3.68	3.68	0.2
4125	41.47	72.93	4014.65	26.24	138.24	456.52	1623348	336130	39°24'54.7	80°49'59.4	476.99	73.153	4.21	3.45	3.68

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4169	42.82	74.03	4047.27	28.03	146.63	484.82	1623376	336138.4	39°24'54.8	80°49'59.1	506.51	73.172	3.5	3.07	2.5
4213	43.38	75.27	4079.4	30.47	154.59	513.82	1623405	336146.3	39°24'54.8	80°49'58.7	536.57	73.255	2.31	1.27	2.82
4258	43.52	76.4	4112.07	33.62	162.16	543.82	1623435	336153.9	39°24'54.9	80°49'58.3	567.48	73.396	1.75	0.31	2.51
4302	43.08	76.71	4144.09	37.06	169.18	573.17	1623464	336160.9	39°24'55.0	80°49'57.9	597.62	73.556	1.11	-1	0.7
4346	42.71	77.22	4176.32	40.69	175.93	602.35	1623494	336167.7	39°24'55.1	80°49'57.6	627.51	73.718	1.15	-0.84	1.16
4390	42.83	75.41	4208.63	43.98	183	631.37	1623523	336174.8	39°24'55.1	80°49'57.2	657.36	73.836	2.81	0.27	-4.11
4434	43.5	75.15	4240.72	46.75	190.65	660.49	1623552	336182.4	39°24'55.2	80°49'56.8	687.45	73.899	1.58	1.52	-0.59
4478	43.47	73.5	4272.64	49.03	198.83	689.64	1623581	336190.6	39°24'55.3	80°49'56.5	717.73	73.917	2.58	-0.07	-3.75
4522	42.41	73.48	4304.85	50.86	207.35	718.38	1623610	336199.1	39°24'55.4	80°49'56.1	747.7	73.9	2.41	-2.41	-0.05
4567	41.7	72.14	4338.27	52.34	216.25	747.17	1623638	336208	39°24'55.5	80°49'55.7	777.84	73.858	2.54	-1.58	-2.98
4611	40.33	70.92	4371.47	53.11	225.4	774.56	1623666	336217.1	39°24'55.6	80°49'55.4	806.69	73.775	3.61	-3.11	-2.77
4655	37.84	69.53	4405.62	53.23	234.77	800.66	1623692	336226.5	39°24'55.7	80°49'55.1	834.37	73.658	6	-5.66	-3.16
4699	36.71	68.58	4440.63	52.79	244.3	825.55	1623717	336236	39°24'55.8	80°49'54.7	860.94	73.516	2.88	-2.57	-2.16
4788	35.94	65.35	4512.34	50.02	264.91	874.06	1623765	336256.7	39°24'56.0	80°49'54.1	913.32	73.139	2.32	-0.87	-3.63
4876	34.6	63.34	4584.19	45.02	286.89	919.86	1623811	336278.6	39°24'56.2	80°49'53.5	963.56	72.678	2.01	-1.52	-2.28
4964	32.63	65.83	4657.47	40.4	307.82	963.84	1623855	336299.6	39°24'56.4	80°49'53.0	1011.8	72.288	2.73	-2.24	2.83
5053	32.59	71.26	4732.46	39.18	325.35	1008.44	1623900	336317.1	39°24'56.6	80°49'52.4	1059.62	72.119	3.29	-0.04	6.1
5141	34.16	72.5	4805.94	40.78	340.39	1054.45	1623946	336332.1	39°24'56.8	80°49'51.8	1108.03	72.109	1.95	1.78	1.41
5230	36.74	70.66	4878.44	42.18	356.72	1103.41	1623995	336348.5	39°24'56.9	80°49'51.2	1159.64	72.084	3.14	2.9	-2.07
5318	36.89	70.49	4948.89	42.71	374.26	1153.14	1624044	336366	39°24'57.1	80°49'50.6	1212.35	72.019	0.21	0.17	-0.19
5406	36.09	72.71	5019.64	44.16	390.79	1202.79	1624094	336382.5	39°24'57.3	80°49'50.0	1264.68	72.001	1.75	-0.91	2.52
5495	36.4	74.95	5091.43	47.68	405.43	1253.32	1624145	336397.2	39°24'57.4	80°49'49.3	1317.26	72.074	1.53	0.35	2.52
5583	37.46	75.14	5161.77	52.33	419.08	1304.4	1624196	336410.8	39°24'57.6	80°49'48.7	1370.07	72.189	1.21	1.2	0.22
5671	38.43	72.75	5231.17	56.04	434.05	1356.39	1624248	336425.8	39°24'57.7	80°49'48.0	1424.15	72.255	2	1.1	-2.72
5760	37.41	67.66	5301.39	56.26	452.53	1407.82	1624299	336444.3	39°24'57.9	80°49'47.4	1478.77	72.18	3.7	-1.15	-5.72
5848	34.27	69.07	5372.72	54.77	471.55	1455.7	1624347	336463.3	39°24'58.1	80°49'46.8	1530.17	72.051	3.69	-3.57	1.6
5936	32.43	71.47	5446.23	54.97	487.9	1501.22	1624392	336479.6	39°24'58.3	80°49'46.2	1578.52	71.996	2.57	-2.09	-0.73
6024	35.11	70.83	5519.38	55.94	503.71	1547.51	1624439	336495.5	39°24'58.4	80°49'45.6	1627.42	71.97	3.07	3.05	-0.73
6113	35.05	72.75	5592.21	57.54	519.7	1596.09	1624487	336511.4	39°24'58.6	80°49'45.0	1678.57	71.964	1.24	-0.07	2.16
6201	34.56	76.1	5664.48	61.4	533.19	1644.45	1624536	336524.9	39°24'58.8	80°49'44.4	1728.73	72.036	2.24	-0.56	3.81
6289	36.17	78.16	5736.24	67.74	544.51	1694.1	1624585	336536.2	39°24'58.9	80°49'43.7	1779.46	72.182	2.28	1.83	2.34
6350	34.81	76.01	5785.91	72.12	552.42	1728.62	1624620	336544.2	39°24'59.0	80°49'43.3	1814.74	72.278	3.03	-2.23	-3.52
6439	36.84	77.21	5858.07	78.13	564.47	1779.29	1624670	336556.2	39°24'59.1	80°49'42.6	1866.68	72.399	2.41	2.28	1.35
6574	41.69	99.05	5963.06	105.15	566.37	1863.55	1624755	336558.1	39°24'59.1	80°49'41.6	1947.72	73.095	10.8	3.59	16.18
6663	43.13	109.71	6028.86	139.01	551.44	1921.5	1624813	336543.2	39°24'59.0	80°49'40.8	1999.06	73.987	8.23	1.62	11.98
6753	48.68	120.81	6091.56	184.97	523.69	1979.63	1624871	336515.4	39°24'58.7	80°49'40.1	2047.72	75.183	10.78	6.17	12.33
6842	54.34	127.26	6146.97	241.37	484.62	2037.19	1624928	336476.4	39°24'58.3	80°49'39.3	2094.04	76.619	8.52	6.36	7.25
6932	57.47	129.28	6197.41	304.76	438.45	2095.68	1624987	336430.2	39°24'57.9	80°49'38.6	2141.05	78.183	3.94	3.48	2.24
7022	61.37	132.78	6243.2	372.54	387.57	2154.07	1625045	336379.3	39°24'57.4	80°49'37.8	2188.66	79.8	5.48	4.33	3.89
7111	66.69	137.27	6282.18	445.05	330.96	2210.54	1625102	336322.7	39°24'56.8	80°49'37.1	2235.17	81.485	7.5	5.98	5.04
7200	69.76	142.48	6315.21	522.62	267.77	2263.74	1625155	336259.5	39°24'56.2	80°49'36.4	2279.52	83.254	6.44	3.45	5.85
7290	73.98	147.04	6343.22	605.11	197.93	2313.03	1625204	336189.7	39°24'55.5	80°49'35.8	2321.48	85.109	6.72	4.69	5.07
7380	79.07	152.37	6364.2	691.17	122.39	2357.11	1625248	336114.1	39°24'54.8	80°49'35.2	2360.29	87.028	8.07	5.66	5.92
7469	84.95	158.35	6376.58	778.94	42.34	2393.79	1625285	336034.1	39°24'54.0	80°49'34.7	2394.17	88.987	9.37	6.61	6.72
7559	87.08	161.86	6382.83	868.7	-42.07	2424.34	1625315	335949.7	39°24'53.2	80°49'34.3	2424.7	90.994	4.55	2.37	3.9
7649	87.01	162.9	6387.47	958.5	-127.73	2451.54	1625343	335864	39°24'52.3	80°49'34.0	2454.87	92.983	1.16	-0.08	1.16
7738	88.68	161.07	6390.82	1047.38	-212.3	2479.05	1625370	335779.5	39°24'51.5	80°49'33.6	2488.12	94.895	2.78	1.88	-2.06
7828	90.03	162.25	6391.83	1137.33	-297.72	2507.36	1625399	335694.1	39°24'50.7	80°49'33.2	2524.98	96.771	1.99	1.5	1.31
7917	90.37	163.18	6391.52	1226.23	-382.7	2533.81	1625425	335609.1	39°24'49.8	80°49'32.9	2562.54	98.589	1.11	0.38	1.04
8007	90.31	161.31	6390.99	1316.16	-468.41	2561.25	1625452	335523.4	39°24'49.0	80°49'32.5	2603.73	100.364	2.08	-0.07	-2.08
8096	90.31	157.26	6390.51	1405.13	-551.63	2592.72	1625484	335440.2	39°24'48.2	80°49'32.1	2650.76	102.011	4.55	0	-4.55
8186	90.31	158.99	6390.02	1495.08	-635.15	2626.25	1625517	335356.6	39°24'47.4	80°49'31.6	2701.97	103.596	1.92	0	1.92
8275	90.28	158.75	6389.56	1584.06	-718.16	2658.34	1625549	335273.6	39°24'46.5	80°49'31.2	2753.64	105.118	0.27	-0.03	-0.27
8365	90.25	158.33	6389.15	1674.03	-801.92	2691.26	1625582	335189.9	39°24'45.7	80°49'30.8	2808.2	106.593	0.47	-0.03	-0.47
8454	90.09	157.92	6388.88	1762.98	-884.52	2724.42	1625616	335107.3	39°24'44.9	80°49'30.3	2864.41	107.987	0.49	-0.18	-0.46

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8544	90.12	157.75	6388.72	1852.92	-967.86	2758.38	1625650	335024	392444.1	8074929.9	2923.25	109.335	0.19	0.03	-0.19
8633	89.94	157.55	6388.67	1941.84	-1050.38	2792.22	1625683	334941.6	392443.3	8074929.4	2983.18	110.612	0.3	-0.2	-0.22
8723	89.91	157.64	6388.79	2031.76	-1133.38	2826.53	1625718	334858.4	392442.5	8074929.0	3045.29	111.85	0.11	-0.03	0.1
8812	89.85	159.71	6388.97	2120.73	-1216.29	2858.89	1625750	334775.5	392441.6	8074928.6	3106.86	113.047	2.33	-0.07	2.33
8902	90.03	160.7	6389.07	2210.73	-1300.97	2889.37	1625780	334690.9	392440.8	8074928.2	3168.75	114.24	1.12	-0.07	1.1
8991	89.94	161.05	6389.09	2299.72	-1385.05	2918.53	1625810	334605.8	392440.0	8074927.8	3230.51	115.388	0.41	-0.1	0.39
9080	89.85	160.94	6389.26	2388.71	-1469.61	2947.51	1625839	334521.6	392439.2	8074927.4	3293.38	116.494	0.16	-0.1	-0.12
9170	89.91	159.8	6389.44	2478.7	-1553.97	2977.74	1625869	334437.9	392438.3	8074927.0	3358.84	117.558	1.27	0.07	-1.27
9259	89.97	160.02	6389.54	2567.7	-1637.56	3008.31	1625899	334354.3	392437.5	8074926.6	3425.13	118.561	0.26	0.07	0.25
9349	90	160.74	6389.56	2657.7	-1722.33	3038.53	1625930	334269.5	392436.7	8074926.2	3492.72	119.546	0.8	0.03	0.8
9439	89.88	160.22	6389.65	2747.7	-1807.16	3068.61	1625960	334184.7	392435.8	8074925.8	3561.2	120.495	0.59	-0.13	-0.58
9528	89.97	162.82	6389.77	2836.66	-1891.56	3098.82	1625988	334100.3	392435.0	8074925.4	3628.81	121.417	2.92	0.1	2.92
9618	90.18	165.72	6389.65	2926.4	-1978.48	3121.21	1626012	334013.7	392434.2	8074925.0	3695.29	122.366	3.23	0.23	3.22
9707	90.43	162.17	6389.18	3015.17	-2063.69	3145.83	1626037	333928.2	392433.3	8074924.7	3762.32	123.265	4	0.28	-3.99
9797	90.18	158.87	6388.7	3105.15	-2148.53	3175.83	1626067	333843.4	392432.5	8074924.3	3834.33	124.079	3.68	-0.28	-3.67
9886	90.25	159.73	6388.37	3194.15	-2231.78	3207.29	1626098	333760.1	392431.7	8074923.9	3907.37	124.832	0.97	0.08	0.97
9976	90.09	160.45	6388.1	3284.15	-2316.4	3237.94	1626129	333675.5	392430.8	8074923.5	3981.2	125.58	0.82	-0.18	0.8
10066	90.28	159.13	6387.93	3374.14	-2400.86	3269.03	1626160	333591.9	392430.0	8074923.1	4055.94	126.295	1.47	0.03	-1.47
10155	90.12	158.24	6387.62	3463.12	-2483.77	3301.38	1626192	333508.1	392429.2	8074922.7	4131.37	126.956	1.02	0.18	-1
10245	90.22	157.41	6387.23	3553.05	-2567.11	3335.35	1626226	333424.8	392428.4	8074922.2	4208.87	127.584	0.92	-0.07	-0.92
10334	90.09	157.97	6386.99	3641.98	-2649.45	3369.13	1626260	333342.5	392427.6	8074921.8	4286.1	128.181	0.65	-0.15	0.63
10424	90.22	159.08	6386.67	3731.95	-2733.2	3402.98	1626293	333258.7	392426.7	8074921.4	4364	128.778	1.24	0.14	1.23
10513	89.88	157.52	6386.67	3820.9	-2815.89	3434.98	1626326	333176.3	392425.9	8074920.9	4441.66	129.344	1.79	-0.38	-1.75
10603	89.69	155.84	6387.01	3910.75	-2898.53	3470.61	1626362	333093.4	392425.1	8074920.5	4521.8	129.867	1.88	-0.21	-1.87
10692	89.75	159.67	6387.44	3999.66	-2980.89	3504.3	1626395	333011.3	392424.3	8074920.0	4600.63	130.386	4.3	0.07	4.3
10782	89.97	161.09	6387.66	4089.66	-3065.66	3534.3	1626426	332928.3	392423.5	8074919.6	4678.8	130.937	1.6	0.24	1.58
10872	89.94	158.84	6387.73	4179.65	-3150.21	3565.35	1626456	332844.7	392422.6	8074919.2	4757.68	131.463	2.5	-0.03	-2.5
10962	89.88	157.55	6387.87	4269.61	-3233.77	3598.78	1626489	332758.2	392421.8	8074918.8	4838.23	131.942	1.43	-0.07	-1.43
11051	89.6	163.26	6388.28	4358.57	-3317.58	3628.62	1626520	332674.4	392421.0	8074918.4	4916.62	132.436	6.42	-0.31	6.42
11141	89.48	164.47	6389	4448.36	-3404.03	3658.63	1626550	332587.9	392420.1	8074918.0	4993.64	132.975	1.35	-0.13	1.34
11230	89.51	162.65	6389.79	4537.18	-3489.39	3678.81	1626570	332502.6	392419.3	8074917.7	5070.45	133.486	2.05	0.03	-2.04
11320	89.51	162.03	6390.55	4627.1	-3575.14	3706.11	1626597	332416.8	392418.5	8074917.3	5149.46	133.97	0.69	0	-0.69
11409	89.78	162.39	6391.11	4716.03	-3659.88	3733.3	1626624	332332.1	392417.6	8074917.0	5228.03	134.431	0.51	0.3	0.4
11499	89.82	161.47	6391.42	4805.98	-3745.44	3761.22	1626652	332246.5	392416.8	8074916.6	5308.02	134.88	1.02	0.04	-1.02
11589	89.94	160.31	6391.61	4895.97	-3830.48	3790.68	1626682	332161.5	392415.9	8074916.2	5389.05	135.299	1.3	-0.13	-1.29
11678	89.85	158.98	6391.77	4984.96	-3913.92	3821.64	1626713	332078.1	392415.1	8074915.8	5470.26	135.683	1.5	-0.1	-1.49
11768	89.82	157.86	6392.03	5074.93	-3997.61	3854.74	1626746	331994.4	392414.3	8074915.4	5553.37	136.042	1.24	-0.03	-1.24
11857	89.88	158.69	6392.26	5163.88	-4080.29	3887.69	1626779	331911.7	392413.5	8074914.9	5635.85	136.385	0.94	0.07	0.93
11947	89.94	159.39	6392.41	5253.87	-4164.33	3919.88	1626811	331827.7	392412.7	8074914.5	5719.01	136.732	0.78	0.07	0.78
12037	89.91	158.99	6392.52	5343.86	-4248.46	3951.85	1626843	331743.5	392411.8	8074914.1	5802.29	137.072	0.45	-0.03	-0.44
12126	89.91	159.52	6392.66	5432.85	-4331.69	3983.38	1626874	331660.3	392411.0	8074913.7	5884.8	137.399	0.6	0	0.6
12216	89.91	159.52	6392.66	5522.82	-4416.45	4013.65	1626905	331575.6	392410.2	8074913.2	5967.78	137.736	1.83	0.03	1.83
12306	89.97	161.73	6392.78	5612.82	-4501.77	4042.26	1626936	331490.2	392409.3	8074912.9	6050.29	138.078	0.62	0.03	0.62
12395	89.91	160.27	6392.85	5701.8	-4585.92	4071.26	1626966	331406.1	392408.5	8074912.5	6132.35	138.402	1.64	-0.07	-1.64
12485	89.82	158.99	6393.16	5791.8	-4670.29	4102.58	1626994	331321.7	392407.7	8074912.1	6216.33	138.703	1.43	-0.1	-1.42
12574	89.94	159.32	6393.34	5880.79	-4753.46	4134.25	1627025	331238.6	392406.9	8074911.7	6299.8	138.985	0.39	0.13	0.37
12663	90	160.12	6393.39	5970.79	-4837.88	4165.45	1627055	331154.1	392406.0	8074911.2	6384.05	139.271	0.89	0.07	0.89
12753	89.88	159.81	6393.48	6059.79	-4921.25	4195.94	1627087	331070.5	392405.2	8074910.8	6467.38	139.55	0.37	-0.13	-0.35
12843	89.88	159.26	6393.67	6149.78	-5005.82	4227.4	1627118	330986.2	392404.4	8074910.4	6552.03	139.819	0.61	0	-0.61
12932	89.85	158.55	6393.88	6238.77	-5088.85	4259.44	1627150	330903.2	392403.6	8074910.0	6636.2	140.07	0.8	-0.03	-0.8
13022	90	158.54	6394	6328.74	-5172.61	4292.36	1627183	330819.4	392402.8	8074909.6	6721.63	140.313	0.17	0.17	-0.01
13111	89.94	158.82	6394.05	6417.71	-5255.52	4324.71	1627216	330736.5	392402.0	8074909.1	6806.15	140.549	0.32	-0.07	0.31
13201	90.06	161.81	6394.05	6507.7	-5340.25	4355.03	1627246	330651.8	392401.1	8074908.7	6890.9	140.802	3.32	0.13	3.32
13291	90.25	168.12	6393.8	6597.32	-5427.13	4378.36	1627269	330564.9	392400.3	8074908.4	6973.07	141.105	7.01	0.21	7.01
13380	90.92	165.4	6392.89	6685.69	-5513.75	4398.74	1627290	330478.3	392399.4	8074908.1	7053.39	141.418	3.15	0.75	-3.06

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13470	90.25	159.77	6391.97	6775.55	-5599.58	4425.67	1627317	330392.5	39°23'58.6	80°49'07.8	7137.36	141.679	6.3	-0.74	-6.26	
13559	90.28	160.15	6391.56	6864.55	-5683.19	4456.16	1627347	330308.9	39°23'57.7	80°49'07.4	7221.92	141.9	0.43	0.03	0.43	
13649	90.28	158.79	6391.12	6954.55	-5767.48	4487.73	1627379	330224.6	39°23'56.9	80°49'07.0	7307.77	142.113	1.51	0	-1.51	
13739	90.34	157.91	6390.64	7044.51	-5851.12	4520.93	1627412	330141	39°23'56.1	80°49'06.5	7394.22	142.308	0.98	0.07	-0.98	
13828	90.34	157.14	6390.11	7133.42	-5933.36	4554.95	1627446	330058.7	39°23'55.3	80°49'06.1	7480.13	142.487	0.87	0	-0.87	
13918	90.46	158.71	6389.48	7223.36	-6016.76	4588.77	1627480	329975.3	39°23'54.5	80°49'05.6	7566.92	142.668	1.75	0.13	1.74	
14007	90.83	162.11	6388.48	7312.34	-6100.59	4618.61	1627510	329891.5	39°23'53.6	80°49'05.2	7651.71	142.872	3.84	0.42	3.82	
14097	90.77	163.95	6387.22	7402.2	-6186.66	4644.87	1627536	329805.4	39°23'52.8	80°49'04.9	7736.25	143.101	2.05	-0.07	2.04	
14187	90.46	159.79	6386.25	7492.13	-6272.17	4672.87	1627564	329719.9	39°23'51.9	80°49'04.5	7821.5	143.313	4.63	-0.34	-4.62	
14276	90.4	159.4	6385.59	7581.12	-6355.58	4703.9	1627595	329636.5	39°23'51.1	80°49'04.1	7906.96	143.494	0.44	-0.07	-0.44	
14366	90.46	158.88	6384.91	7671.11	-6439.68	4735.95	1627627	329552.4	39°23'50.3	80°49'03.7	7993.66	143.668	0.58	0.07	-0.58	
14456	90.43	158.9	6384.21	7761.09	-6523.64	4768.36	1627659	329468.5	39°23'49.5	80°49'03.2	8080.54	143.836	0.04	-0.03	0.02	
14545	89.88	158.97	6383.97	7850.07	-6606.69	4800.35	1627691	329385.4	39°23'48.7	80°49'02.8	8166.5	143.998	0.62	-0.62	0.08	
14635	89.91	158.58	6384.14	7940.05	-6690.58	4832.93	1627724	329301.5	39°23'47.8	80°49'02.4	8253.55	144.158	0.43	0.03	-0.43	
14724	89.94	158.72	6384.25	8029.03	-6773.47	4865.33	1627756	329218.7	39°23'47.0	80°49'02.0	8339.75	144.311	0.16	0.03	0.16	
14814	90	159.57	6384.3	8119.02	-6857.58	4897.37	1627788	329134.6	39°23'46.2	80°49'01.5	8426.78	144.467	0.95	0.07	0.94	
14904	90.25	159.64	6384.1	8209.01	-6941.94	4928.74	1627820	329050.2	39°23'45.4	80°49'01.1	8513.69	144.625	0.29	0.28	0.08	
14993	90.25	158.97	6383.71	8298	-7025.19	4960.19	1627851	328967	39°23'44.5	80°49'00.7	8599.81	144.776	0.75	0	-0.75	
15083	90.22	157.86	6383.35	8387.97	-7108.88	4993.3	1627884	328883.3	39°23'43.7	80°49'00.3	8687.3	144.916	1.23	-0.03	-1.23	
15172	89.91	157.88	6383.24	8476.91	-7191.32	5026.82	1627918	328800.8	39°23'42.9	80°48'59.8	8774.06	145.046	0.35	-0.35	0.02	
15262	89.91	159.25	6383.39	8566.88	-7275.09	5059.71	1627951	328717.1	39°23'42.1	80°48'59.4	8861.59	145.182	1.52	0	1.52	
15351	90.4	160.02	6383.15	8655.87	-7358.53	5090.68	1627982	328633.6	39°23'41.3	80°48'59.0	8947.79	145.324	1.03	0.55	0.87	
15441	90.74	160.76	6382.25	8745.87	-7443.31	5120.89	1628012	328548.9	39°23'40.4	80°48'58.6	9034.73	145.473	0.9	0.38	0.82	
15531	90.62	160.99	6381.18	8835.85	-7528.33	5150.37	1628041	328463.8	39°23'39.6	80°48'58.2	9121.52	145.623	0.29	-0.13	0.26	
15620	90.25	160.38	6380.51	8924.84	-7612.32	5179.81	1628071	328379.9	39°23'38.8	80°48'57.8	9207.49	145.767	0.8	-0.42	-0.69	
15710	90.12	157.87	6380.22	9014.82	-7696.4	5211.88	1628103	328295.8	39°23'37.9	80°48'57.4	9295.07	145.895	2.79	-0.14	-2.79	
15800	89.91	158.47	6380.19	9104.77	-7779.95	5245.34	1628136	328212.2	39°23'37.1	80°48'56.9	9383.03	146.012	0.71	-0.23	0.67	
15889	89.82	159.33	6380.4	9193.76	-7862.98	5277.38	1628168	328129.2	39°23'36.3	80°48'56.5	9469.81	146.132	0.97	-0.1	0.97	
15979	89.91	160.1	6380.61	9283.76	-7947.4	5308.58	1628200	328044.8	39°23'35.5	80°48'56.1	9557.31	146.258	0.86	0.1	0.86	
16069	89.88	160.55	6380.78	9373.75	-8032.14	5338.89	1628230	327960.1	39°23'34.6	80°48'55.7	9644.64	146.388	0.5	-0.03	0.5	
16120	89.97	160.12	6380.85	9424.75	-8080.17	5356.05	1628247	327912	39°23'34.2	80°48'55.5	9694.14	146.461	0.86	0.18	-0.84	
BHL	16145	89.97	160.12	6380.86	9449.75	-8103.68	5364.55	1628256	327888.5	39°23'33.9	80°48'55.4	9718.44	146.496	0	0	0

T A R G E T S

Name	MD [ft]	TVD [ft]	North [ft]	East [ft]	Grid East [US ft]	Grid North [US ft]	Latitude	Longitude	Shape	Comment
SHR-40D-HS BHL Rev-1		6376	-8106.39	5355.76	1628247	327885.8	39°23'33.9	80°48'55.5	point	
SHR-40D-HS LP Rev-2		6376	21.95	2397.28	1625288	336013.7	39°24'53.8	80°49'34.7	point	
SHR-40 Pad LL		6599.46	50.7	31.31	1622923	336042.5	39°24'53.8	80°50'04.8	polygon	

WELLPATH COMPOSITION Ref Wellbore: SHR-40D-HS AWB Ref Wellpath: SHR-40D-HS AWP Proj: 16145'

Log Name/	Start MD [ft]	End MD [ft]	Pos Unc	Model
O1_VES Gy	19.4	2623		Generic gyro - northseeking (Standard)
O2_SDI Gyr	2623	6289		Generic gyro - continuous (Standard)
O3_BHI AT	6289	16120		NaviTrak (AT Curve Short Spaced)
Projection	16120	16145		Blind Drilling (std)

C O M M E N T S

Wellpath general comments
 API: 47-095-02212-0000
 BHI Job #: 7250516
 Rig: Precision 542
 Duration: 5/16/2015-5/23/2015

VES Gyro <8-3/4> (100'-2619)'
SDI Gyro <8-3/4> (2619)(2663'-6283)'
BHI AT Curve <8-3/4> (6289)(6350'-16120)'
Projected MD at TD: 16145'

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