

# KERR-MCGEE OIL & GAS ONSHORE LP

Location: COLORADO Slot: SLOT#01 MARRS 2N-28HZ (275'FSL & 1874'FEL, SEC.28)  
Field: WELD COUNTY (KERR MCGEE) Well: MARRS 2N-28HZ  
Facility: SEC.28-T1N-R66W Wellbore: MARRS 2N-28HZ PWB

Plot reference wellpath is MARRS 2N-28HZ (REV-C.0) PWP

True vertical depths are referenced to XTREME 6 (RKB)

Grid System: NAD83 / Lambert Colorado SP, Northern Zone (501), US feet

Measured depths are referenced to XTREME 6 (RKB)

North Reference: True north

XTREME 6 (RKB) to Mean Sea Level: 5121 feet

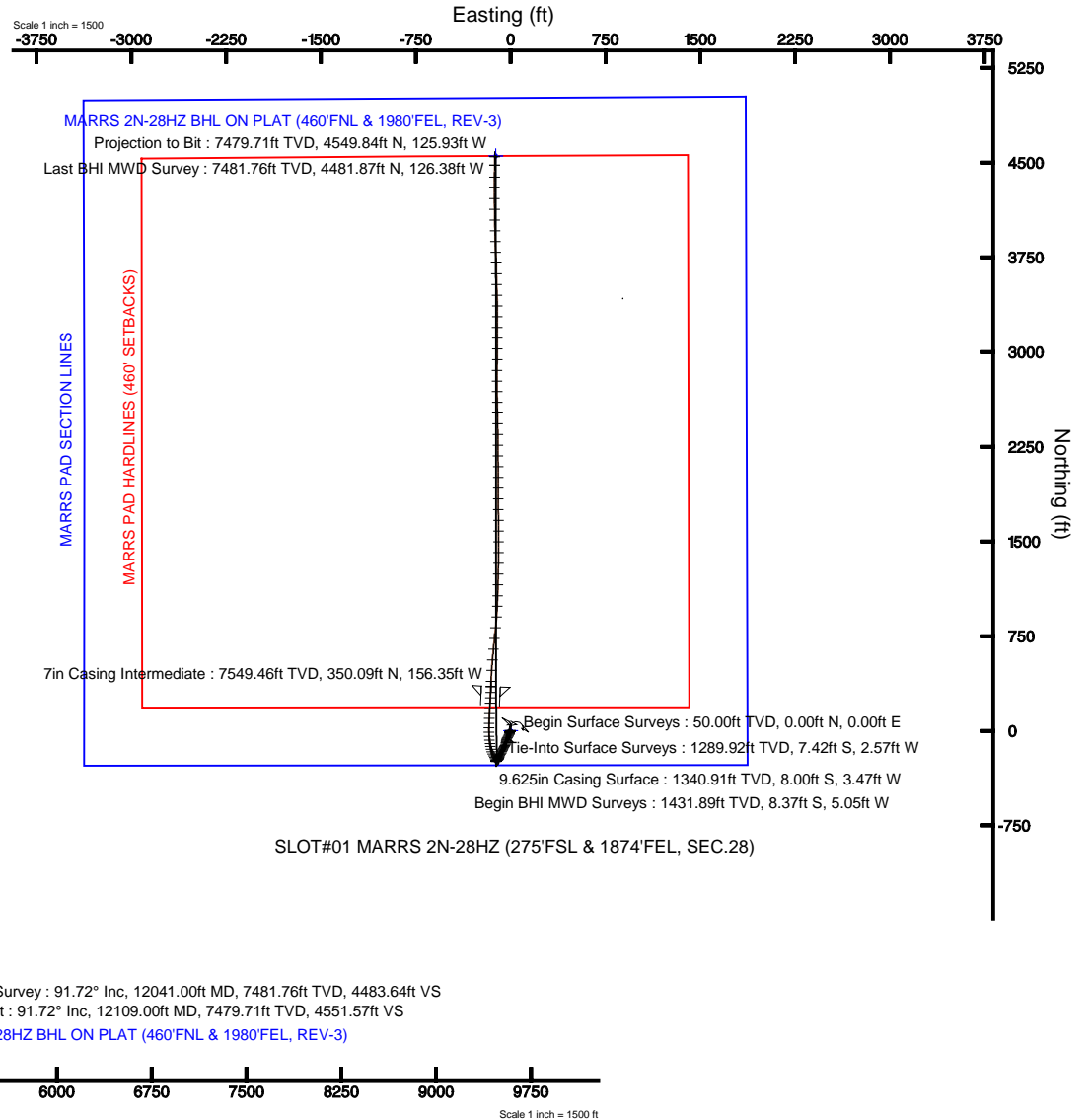
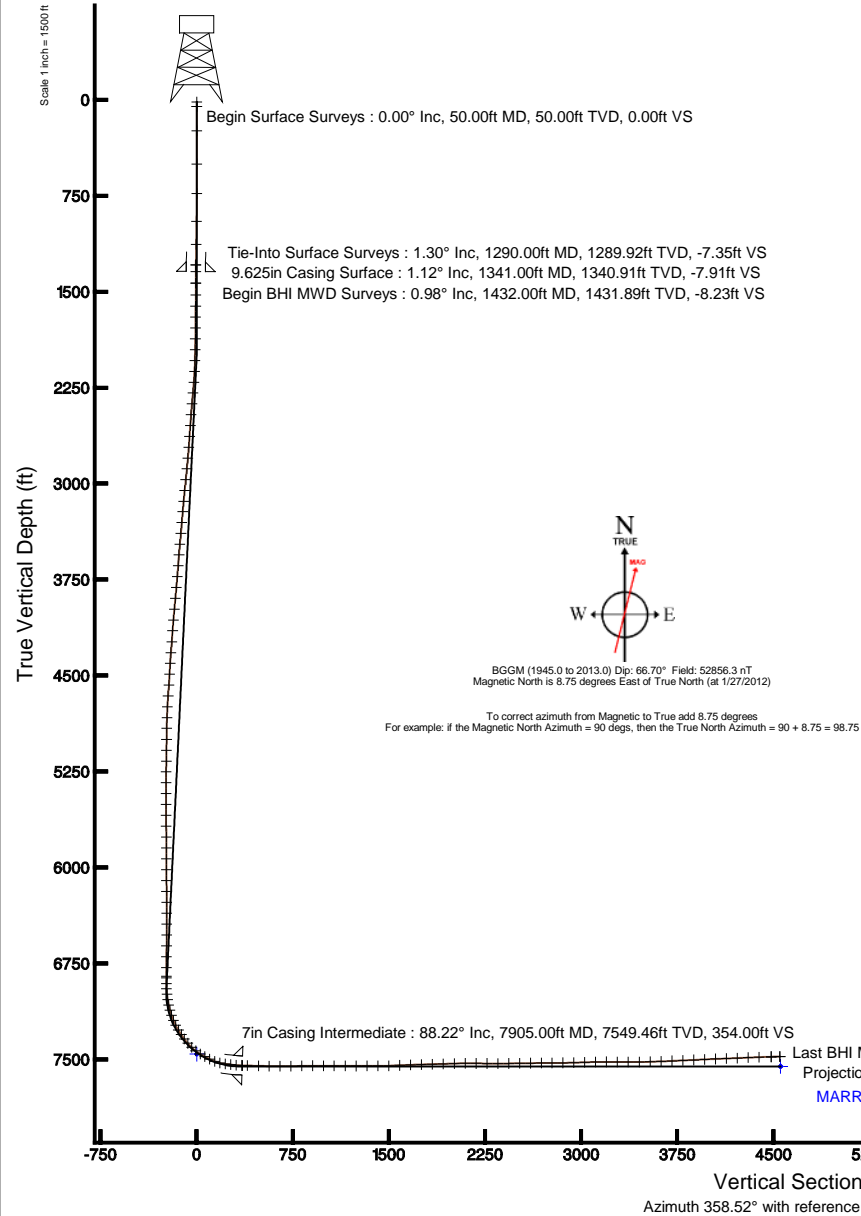
Scale: True distance

Mean Sea Level to Mud line (At Slot: SLOT#01 MARRS 2N-28HZ (275'FSL & 1874'FEL, SEC.28)): 0 feet

Depths are in feet

Coordinates are in feet referenced to Slot

Created by: wilsje02 on 2/27/2012





# Actual Wellpath Report

MARRS 2N-28HZ AWP

Page 1 of 6



## REFERENCE WELLPATH IDENTIFICATION

Operator	KERR-MCGEE OIL & GAS ONSHORE LP	Slot	SLOT#01 MARRS 2N-28HZ (275'FSL & 1874'FEL, SEC.28)
Area	COLORADO	Well	MARRS 2N-28HZ
Field	WELD COUNTY (KERR MCGEE)	Wellbore	MARRS 2N-28HZ AWB
Facility	SEC.28-T1N-R66W		

## REPORT SETUP INFORMATION

Projection System	NAD83 / Lambert Colorado SP, Northern Zone (501), US feet	Software System	WellArchitect® 3.0.2
North Reference	True	User	Wilsjef02
Scale	0.999965	Report Generated	2/27/2012 at 13:47:10
Convergence at slot	0.47° East	Database/Source file	WellArchitectDB/MARRS_2N-28HZ_AWB.xml

## WELLPATH LOCATION

	Local coordinates		Grid coordinates		Geographic coordinates	
	North[ft]	East[ft]	Easting[US ft]	Northing[US ft]	Latitude	Longitude
Slot Location	-0.10	0.08	3201832.76	1249388.96	40°00'56.549"N	104°46'45.804"W
Facility Reference Pt			3201832.68	1249389.06	40°00'56.550"N	104°46'45.805"W
Field Reference Pt			3197771.84	1268891.29	40°04'09.600"N	104°47'36.000"W

## WELLPATH DATUM

Calculation method	Minimum curvature	XTREME 6 (RKB) to Facility Vertical Datum	5121.00ft
Horizontal Reference Pt	Slot	XTREME 6 (RKB) to Mean Sea Level	5121.00ft
Vertical Reference Pt	XTREME 6 (RKB)	XTREME 6 (RKB) to Mud Line at Slot (SLOT#01 MARRS 2N-28HZ (275'FSL & 1874'FEL, SEC.28))	5121.00ft
MD Reference Pt	XTREME 6 (RKB)	Section Origin	N 0.00, E 0.00 ft
Field Vertical Reference	Mean Sea Level	Section Azimuth	358.52°



# Actual Wellpath Report

MARRS 2N-28HZ AWP

Page 2 of 6



## REFERENCE WELLPATH IDENTIFICATION

Operator	KERR-MCGEE OIL & GAS ONSHORE LP	Slot	SLOT#01 MARRS 2N-28HZ (275'FSL & 1874'FEL, SEC.28)
Area	COLORADO	Well	MARRS 2N-28HZ
Field	WELD COUNTY (KERR MCGEE)	Wellbore	MARRS 2N-28HZ AWB
Facility	SEC.28-T1N-R66W		

## WELLPATH DATA (150 stations) † = interpolated/extrapolated station

MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	Latitude	Longitude	DLS [°/100ft]	Comments
0.00†	0.000	270.800	0.00	0.00	0.00	0.00	40°00'56.549"N	104°46'45.804"W	0.00	
16.00	0.000	270.800	16.00	0.00	0.00	0.00	40°00'56.549"N	104°46'45.804"W	0.00	
50.00	0.000	10.000	50.00	0.00	0.00	0.00	40°00'56.549"N	104°46'45.804"W	0.00	Begin Surface Surveys
240.00	0.700	270.800	240.00	0.05	0.02	-1.16	40°00'56.549"N	104°46'45.819"W	0.37	
500.00	0.300	63.500	499.99	0.40	0.34	-2.14	40°00'56.552"N	104°46'45.831"W	0.38	
731.00	0.500	136.700	730.99	-0.10	-0.12	-0.91	40°00'56.548"N	104°46'45.816"W	0.22	
950.00	0.700	174.000	949.97	-2.14	-2.15	-0.11	40°00'56.528"N	104°46'45.805"W	0.20	
1130.00	1.100	200.500	1129.95	-4.84	-4.86	-0.60	40°00'56.501"N	104°46'45.812"W	0.32	
1290.00	1.300	231.800	1289.92	-7.35	-7.42	-2.57	40°00'56.476"N	104°46'45.837"W	0.42	Tie-Into Surface Surveys
1432.00	0.980	272.380	1431.89	-8.23	-8.37	-5.05	40°00'56.466"N	104°46'45.869"W	0.60	Begin BHI MWD Surveys
1524.00	0.800	252.680	1523.88	-8.36	-8.52	-6.44	40°00'56.465"N	104°46'45.887"W	0.38	
1612.00	0.910	204.370	1611.87	-9.15	-9.34	-7.32	40°00'56.457"N	104°46'45.898"W	0.80	
1698.00	0.370	205.230	1697.87	-10.02	-10.22	-7.72	40°00'56.448"N	104°46'45.903"W	0.63	
1783.00	0.420	226.000	1782.87	-10.47	-10.68	-8.06	40°00'56.443"N	104°46'45.908"W	0.18	
1868.00	1.140	165.430	1867.86	-11.51	-11.72	-8.07	40°00'56.433"N	104°46'45.908"W	1.18	
1953.00	1.470	167.320	1952.84	-13.40	-13.60	-7.62	40°00'56.415"N	104°46'45.902"W	0.39	
2037.00	1.370	170.970	2036.81	-15.45	-15.64	-7.23	40°00'56.394"N	104°46'45.897"W	0.16	
2122.00	2.790	189.960	2121.75	-18.49	-18.68	-7.42	40°00'56.364"N	104°46'45.899"W	1.83	
2207.00	4.410	200.960	2206.58	-23.53	-23.77	-8.95	40°00'56.314"N	104°46'45.919"W	2.06	
2292.00	5.970	206.250	2291.23	-30.47	-30.79	-12.08	40°00'56.245"N	104°46'45.959"W	1.92	
2377.00	5.680	203.630	2375.79	-38.19	-38.61	-15.72	40°00'56.167"N	104°46'46.006"W	0.46	
2463.00	5.000	209.860	2461.42	-45.24	-45.76	-19.29	40°00'56.097"N	104°46'46.052"W	1.04	
2548.00	4.550	214.560	2546.13	-51.14	-51.75	-23.05	40°00'56.038"N	104°46'46.100"W	0.70	
2633.00	4.960	214.220	2630.83	-56.85	-57.56	-27.02	40°00'55.980"N	104°46'46.151"W	0.48	
2718.00	5.200	204.220	2715.50	-63.30	-64.11	-30.67	40°00'55.915"N	104°46'46.198"W	1.08	
2803.00	4.920	192.450	2800.17	-70.31	-71.18	-33.04	40°00'55.846"N	104°46'46.229"W	1.26	
2887.00	6.050	190.890	2883.79	-78.13	-79.05	-34.65	40°00'55.768"N	104°46'46.249"W	1.36	
2972.00	5.280	185.130	2968.37	-86.39	-87.34	-35.85	40°00'55.686"N	104°46'46.265"W	1.13	
3057.00	5.970	184.590	3052.96	-94.67	-95.64	-36.55	40°00'55.604"N	104°46'46.274"W	0.81	
3142.00	5.800	200.020	3137.52	-103.06	-104.09	-38.37	40°00'55.520"N	104°46'46.297"W	1.87	
3224.00	5.430	204.040	3219.13	-110.42	-111.52	-41.37	40°00'55.447"N	104°46'46.336"W	0.66	
3310.00	4.800	210.820	3304.78	-117.13	-118.33	-44.87	40°00'55.380"N	104°46'46.381"W	1.01	
3395.00	6.280	208.860	3389.38	-124.15	-125.46	-48.94	40°00'55.309"N	104°46'46.433"W	1.76	
3480.00	6.130	209.120	3473.89	-132.07	-133.49	-53.39	40°00'55.230"N	104°46'46.490"W	0.18	
3564.00	5.240	210.420	3557.47	-139.19	-140.72	-57.52	40°00'55.158"N	104°46'46.543"W	1.07	
3649.00	4.760	205.730	3642.15	-145.62	-147.24	-61.01	40°00'55.094"N	104°46'46.588"W	0.74	
3735.00	5.610	202.450	3727.80	-152.64	-154.34	-64.17	40°00'55.024"N	104°46'46.629"W	1.05	
3820.00	4.880	203.520	3812.44	-159.71	-161.50	-67.20	40°00'54.953"N	104°46'46.668"W	0.87	
3905.00	5.660	199.930	3897.08	-166.89	-168.75	-70.07	40°00'54.881"N	104°46'46.705"W	1.00	
3990.00	5.970	201.430	3981.64	-174.87	-176.81	-73.11	40°00'54.802"N	104°46'46.744"W	0.41	
4075.00	6.090	214.980	4066.18	-182.57	-184.62	-77.31	40°00'54.725"N	104°46'46.798"W	1.68	
4160.00	5.210	218.190	4150.76	-189.16	-191.34	-82.28	40°00'54.658"N	104°46'46.862"W	1.10	
4246.00	4.950	209.200	4236.43	-195.36	-197.65	-86.51	40°00'54.596"N	104°46'46.916"W	0.97	
4331.00	5.210	200.670	4321.09	-202.09	-204.46	-89.66	40°00'54.528"N	104°46'46.956"W	0.94	
4416.00	3.860	197.100	4405.83	-208.38	-210.81	-91.86	40°00'54.466"N	104°46'46.985"W	1.62	
4501.00	3.030	190.490	4490.67	-213.29	-215.75	-93.11	40°00'54.417"N	104°46'47.001"W	1.08	
4586.00	3.860	192.840	4575.52	-218.26	-220.75	-94.16	40°00'54.367"N	104°46'47.014"W	0.99	
4671.00	4.800	209.460	4660.28	-224.08	-226.64	-96.54	40°00'54.309"N	104°46'47.045"W	1.83	
4757.00	4.320	223.100	4746.01	-229.47	-232.14	-100.53	40°00'54.255"N	104°46'47.096"W	1.37	
4842.00	3.290	237.110	4830.82	-233.02	-235.80	-104.76	40°00'54.219"N	104°46'47.150"W	1.62	
4925.00	2.400	243.440	4913.72	-235.00	-237.87	-108.32	40°00'54.198"N	104°46'47.196"W	1.14	
5011.00	1.280	244.680	4999.67	-236.15	-239.09	-110.80	40°00'54.186"N	104°46'47.228"W	1.30	
5096.00	0.790	186.110	5084.66	-237.12	-240.07	-111.72	40°00'54.177"N	104°46'47.240"W	1.29	
5181.00	0.960	200.190	5169.65	-238.36	-241.33	-112.02	40°00'54.164"N	104°46'47.244"W	0.32	
5264.00	0.980	215.330	5252.64	-239.58	-242.56	-112.67	40°00'54.152"N	104°46'47.252"W	0.31	
5349.00	1.500	244.070	5337.62	-240.62	-243.64	-114.10	40°00'54.141"N	104°46'47.270"W	0.94	
5434.00	0.540	277.390	5422.60	-241.02	-244.07	-115.49	40°00'54.137"N	104°46'47.288"W	1.28	
5519.00	0.430	298.300	5507.60	-240.80	-243.87	-116.17	40°00'54.139"N	104°46'47.297"W	0.24	
5604.00	0.660	307.760	5592.60	-240.33	-243.42	-116.84	40°00'54.143"N	104°46'47.306"W	0.29	
5689.00	0.980	352.920	5677.59	-239.30	-242.40	-117.32	40°00'54.154"N	104°46'47.312"W	0.82	



# Actual Wellpath Report

MARRS 2N-28HZ AWP

Page 3 of 6



## REFERENCE WELLPATH IDENTIFICATION

Operator	KERR-MCGEE OIL & GAS ONSHORE LP	Slot	SLOT#01 MARRS 2N-28HZ (275'FSL & 1874'FEL, SEC.28)
Area	COLORADO	Well	MARRS 2N-28HZ
Field	WELD COUNTY (KERR MCGEE)	Wellbore	MARRS 2N-28HZ AWB
Facility	SEC.28-T1N-R66W		

## WELLPATH DATA (150 stations) † = interpolated/extrapolated station

MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	Latitude	Longitude	DLS [°/100ft]	Comments
5775.00	1.190	25.400	5763.58	-237.77	-240.86	-117.02	40°00'54.169"N	104°46'47.308"W	0.74	
5860.00	0.860	77.570	5848.56	-236.86	-239.93	-116.02	40°00'54.178"N	104°46'47.295"W	1.12	
5945.00	0.500	98.640	5933.56	-236.80	-239.84	-115.03	40°00'54.179"N	104°46'47.282"W	0.51	
6030.00	0.340	71.990	6018.56	-236.80	-239.82	-114.43	40°00'54.179"N	104°46'47.275"W	0.29	
6115.00	0.340	42.510	6103.55	-236.54	-239.56	-114.02	40°00'54.182"N	104°46'47.269"W	0.20	
6200.00	0.180	340.810	6188.55	-236.23	-239.25	-113.89	40°00'54.185"N	104°46'47.268"W	0.35	
6286.00	0.830	338.710	6274.55	-235.52	-238.54	-114.16	40°00'54.192"N	104°46'47.271"W	0.76	
6371.00	0.250	315.320	6359.55	-234.81	-237.83	-114.51	40°00'54.199"N	104°46'47.276"W	0.72	
6456.00	0.420	106.740	6444.54	-234.77	-237.79	-114.35	40°00'54.199"N	104°46'47.274"W	0.77	
6541.00	0.680	135.500	6529.54	-235.23	-238.24	-113.69	40°00'54.195"N	104°46'47.265"W	0.44	
6626.00	1.070	142.370	6614.53	-236.24	-239.23	-112.86	40°00'54.185"N	104°46'47.254"W	0.47	
6711.00	0.710	127.600	6699.52	-237.22	-240.18	-111.95	40°00'54.175"N	104°46'47.243"W	0.50	
6796.00	0.590	133.460	6784.51	-237.86	-240.80	-111.22	40°00'54.169"N	104°46'47.233"W	0.16	
6864.00	0.500	131.720	6852.51	-238.31	-241.24	-110.74	40°00'54.165"N	104°46'47.227"W	0.13	
6877.00	0.700	114.770	6865.51	-238.38	-241.31	-110.63	40°00'54.164"N	104°46'47.226"W	2.04	
6920.00	0.300	39.370	6908.51	-238.41	-241.33	-110.32	40°00'54.164"N	104°46'47.452"W	1.60	
6962.00	3.750	338.570	6950.48	-237.04	-239.97	-110.75	40°00'54.178"N	104°46'47.227"W	8.60	
7005.00	7.360	330.980	6993.27	-233.27	-236.25	-112.60	40°00'54.214"N	104°46'47.251"W	8.55	
7047.00	10.710	325.530	7034.74	-227.61	-230.68	-116.12	40°00'54.269"N	104°46'47.296"W	8.22	
7090.00	14.780	324.600	7076.68	-219.71	-222.91	-121.56	40°00'54.346"N	104°46'47.366"W	9.48	
7133.00	17.870	328.070	7117.94	-209.47	-212.84	-128.23	40°00'54.446"N	104°46'47.452"W	7.53	
7175.00	21.520	331.380	7157.48	-197.05	-200.60	-135.33	40°00'54.567"N	104°46'47.543"W	9.08	
7218.00	24.540	335.720	7197.05	-181.80	-185.53	-142.78	40°00'54.715"N	104°46'47.639"W	8.05	
7260.00	27.660	342.830	7234.77	-164.36	-168.26	-149.25	40°00'54.886"N	104°46'47.722"W	10.51	
7303.00	30.990	346.060	7272.26	-143.94	-147.97	-154.86	40°00'55.087"N	104°46'47.794"W	8.57	
7346.00	33.950	349.590	7308.53	-121.26	-125.41	-159.70	40°00'55.310"N	104°46'47.857"W	8.17	
7388.00	37.030	351.530	7342.73	-97.12	-101.36	-163.68	40°00'55.547"N	104°46'47.908"W	7.81	
7431.00	41.010	353.590	7376.13	-70.20	-74.52	-167.17	40°00'55.813"N	104°46'47.953"W	9.73	
7474.00	46.090	355.440	7407.29	-40.65	-45.04	-169.97	40°00'56.104"N	104°46'47.989"W	12.18	
7516.00	52.220	358.700	7434.75	-8.91	-13.33	-171.56	40°00'56.417"N	104°46'48.009"W	15.73	
7559.00	57.300	0.880	7459.55	26.18	21.77	-171.66	40°00'56.764"N	104°46'48.010"W	12.52	
7601.00	62.710	2.170	7480.54	62.49	58.12	-170.68	40°00'57.123"N	104°46'47.998"W	13.15	
7644.00	63.650	2.980	7499.94	100.77	96.45	-168.96	40°00'57.502"N	104°46'47.976"W	2.76	
7687.00	68.840	3.000	7517.26	139.99	135.74	-166.91	40°00'57.890"N	104°46'47.949"W	12.07	
7729.00	75.450	3.030	7530.13	179.83	175.64	-164.81	40°00'58.285"N	104°46'47.922"W	15.74	
7772.00	82.270	2.860	7538.43	221.87	217.75	-162.64	40°00'58.701"N	104°46'47.894"W	15.87	
7814.00	84.240	2.690	7543.36	263.46	259.41	-160.62	40°00'59.113"N	104°46'47.868"W	4.71	
7857.00	85.960	2.700	7547.04	306.19	302.20	-158.61	40°00'59.535"N	104°46'47.843"W	4.00	
7904.00	88.210	2.700	7549.43	353.00	349.09	-156.39	40°01'00.000"N	104°46'47.814"W	4.79	
7905.00†	88.221	2.700	7549.46	354.00	350.09	-156.35	40°01'00.009"N	104°46'47.814"W	1.10	7" Casing Point
7945.00	88.660	2.700	7550.55	393.87	390.03	-154.46	40°01'00.403"N	104°46'47.789"W	1.10	
8032.00	88.330	2.900	7552.83	480.60	476.89	-150.22	40°01'01.262"N	104°46'47.735"W	0.44	
8117.00	89.320	5.250	7554.57	565.18	561.65	-144.18	40°01'02.099"N	104°46'47.657"W	3.00	
8202.00	90.240	5.630	7554.90	649.56	646.27	-136.12	40°01'02.936"N	104°46'47.554"W	1.17	
8287.00	89.900	5.710	7554.80	733.90	730.85	-127.72	40°01'03.771"N	104°46'47.446"W	0.41	
8372.00	91.600	6.050	7553.68	818.19	815.39	-119.01	40°01'04.607"N	104°46'47.334"W	2.04	
8458.00	90.790	4.270	7551.89	903.59	901.02	-111.28	40°01'05.453"N	104°46'47.234"W	2.27	
8543.00	88.920	2.380	7552.10	988.28	985.87	-106.35	40°01'06.292"N	104°46'47.171"W	3.13	
8627.00	89.600	2.570	7553.19	1072.08	1069.79	-102.73	40°01'07.121"N	104°46'47.124"W	0.84	
8713.00	90.000	1.350	7553.49	1157.92	1155.73	-99.78	40°01'07.970"N	104°46'47.087"W	1.49	
8798.00	89.530	1.130	7553.84	1242.82	1240.71	-97.94	40°01'08.810"N	104°46'47.063"W	0.61	
8883.00	90.580	1.280	7553.76	1327.73	1325.69	-96.16	40°01'09.650"N	104°46'47.040"W	1.25	
8968.00	89.960	0.180	7553.36	1412.66	1410.68	-95.07	40°01'10.490"N	104°46'47.026"W	1.49	
9054.00	91.910	359.850	7551.95	1498.62	1496.67	-95.05	40°01'11.340"N	104°46'47.026"W	2.30	
9139.00	92.340	359.510	7548.80	1583.54	1581.61	-95.53	40°01'12.179"N	104°46'47.032"W	0.64	
9224.00	92.860	359.630	7544.95	1668.44	1666.52	-96.16	40°01'13.018"N	104°46'47.040"W	0.63	
9309.00	91.160	359.080	7541.96	1753.38	1751.46	-97.12	40°01'13.857"N	104°46'47.052"W	2.10	
9394.00	91.940	359.510	7539.67	1838.34	1836.42	-98.17	40°01'14.697"N	104°46'47.066"W	1.05	
9479.00	91.380	0.230	7537.20	1923.28	1921.38	-98.36	40°01'15.537"N	104°46'47.068"W	1.07	
9565.00	91.870	359.840	7534.76	2009.21	2007.35	-98.31	40°01'16.386"N	104°46'47.068"W	0.73	



# Actual Wellpath Report

MARRS 2N-28HZ AWP

Page 4 of 6



## REFERENCE WELLPATH IDENTIFICATION

Operator	KERR-MCGEE OIL & GAS ONSHORE LP	Slot	SLOT#01 MARRS 2N-28HZ (275'FSL & 1874'FEL, SEC.28)
Area	COLORADO	Well	MARRS 2N-28HZ
Field	WELD COUNTY (KERR MCGEE)	Wellbore	MARRS 2N-28HZ AWB
Facility	SEC.28-T1N-R66W		

## WELLPATH DATA (150 stations)

MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	Latitude	Longitude	DLS [°/100ft]	Comments
9650.00	89.960	359.420	7533.41	2094.18	2092.33	-98.85	40°01'17.226"N	104°46'47.075"W	2.30	
9735.00	89.550	359.120	7533.77	2179.17	2177.32	-99.94	40°01'18.066"N	104°46'47.089"W	0.60	
9820.00	89.900	359.610	7534.18	2264.16	2262.31	-100.88	40°01'18.906"N	104°46'47.101"W	0.71	
9905.00	89.630	359.790	7534.53	2349.14	2347.31	-101.32	40°01'19.746"N	104°46'47.106"W	0.38	
9991.00	90.890	358.660	7534.14	2435.13	2433.30	-102.49	40°01'20.596"N	104°46'47.121"W	1.97	
10075.00	90.830	359.000	7532.88	2519.12	2517.27	-104.20	40°01'21.425"N	104°46'47.143"W	0.41	
10161.00	90.520	358.750	7531.86	2605.11	2603.25	-105.89	40°01'22.275"N	104°46'47.165"W	0.46	
10246.00	91.070	359.850	7530.68	2690.10	2688.23	-106.93	40°01'23.115"N	104°46'47.178"W	1.45	
10329.00	90.550	359.860	7529.51	2773.07	2771.23	-107.14	40°01'23.935"N	104°46'47.181"W	0.63	
10414.00	89.840	0.240	7529.22	2858.03	2856.22	-107.07	40°01'24.775"N	104°46'47.180"W	0.95	
10498.00	91.780	0.700	7528.03	2941.97	2940.21	-106.38	40°01'25.605"N	104°46'47.171"W	2.37	
10583.00	91.870	0.270	7525.33	3026.88	3025.16	-105.66	40°01'26.445"N	104°46'47.162"W	0.52	
10669.00	91.660	359.210	7522.68	3112.82	3111.12	-106.05	40°01'27.294"N	104°46'47.167"W	1.26	
10754.00	89.660	0.100	7521.70	3197.79	3196.11	-106.56	40°01'28.134"N	104°46'47.174"W	2.58	
10839.00	89.230	1.020	7522.52	3282.73	3281.10	-105.73	40°01'28.974"N	104°46'47.163"W	1.19	
10924.00	89.130	359.070	7523.74	3367.69	3366.09	-105.66	40°01'29.814"N	104°46'47.162"W	2.30	
11009.00	91.040	358.490	7523.61	3452.68	3451.06	-107.47	40°01'30.653"N	104°46'47.185"W	2.35	
11095.00	92.270	358.320	7521.13	3538.65	3536.99	-109.86	40°01'31.503"N	104°46'47.216"W	1.44	
11180.00	91.870	359.080	7518.06	3623.59	3621.91	-111.79	40°01'32.342"N	104°46'47.241"W	1.01	
11265.00	93.070	357.870	7514.39	3708.51	3706.80	-114.05	40°01'33.181"N	104°46'47.270"W	2.00	
11350.00	92.200	356.870	7510.49	3793.40	3791.62	-117.95	40°01'34.019"N	104°46'47.320"W	1.56	
11435.00	92.860	358.580	7506.73	3878.30	3876.47	-121.32	40°01'34.857"N	104°46'47.363"W	2.15	
11521.00	92.430	358.430	7502.77	3964.21	3962.35	-123.56	40°01'35.706"N	104°46'47.392"W	0.53	
11605.00	92.640	359.460	7499.05	4048.13	4046.25	-125.10	40°01'36.535"N	104°46'47.412"W	1.25	
11690.00	92.180	358.660	7495.48	4133.05	4131.16	-126.50	40°01'37.374"N	104°46'47.430"W	1.08	
11776.00	92.180	359.660	7492.20	4218.98	4217.09	-127.76	40°01'38.223"N	104°46'47.446"W	1.16	
11861.00	92.760	0.560	7488.54	4303.87	4302.01	-127.59	40°01'39.063"N	104°46'47.444"W	1.26	
11946.00	92.110	0.310	7484.93	4388.74	4386.93	-126.95	40°01'39.902"N	104°46'47.436"W	0.82	
12041.00	91.720	0.380	7481.76	4483.64	4481.87	-126.38	40°01'40.840"N	104°46'47.429"W	0.42	Last BHI MWD Survey
12109.00	91.720	0.380	7479.71	4551.57	4549.84	-125.93	40°01'41.512"N	104°46'47.423"W	0.00	Projection to Bit

## HOLE & CASING SECTIONS - Ref Wellbore: MARRS 2N-28HZ AWB Ref Wellpath: MARRS 2N-28HZ AWP

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]
12.25in Open Hole	16.00	1341.00	1325.00	16.00	1340.91	0.00	0.00	-8.00	-3.47
9.625in Casing Surface	16.00	1341.00	1325.00	16.00	1340.91	0.00	0.00	-8.00	-3.47
8.75in Open Hole	1341.00	7911.00	6570.00	1340.91	7549.64	-8.00	-3.47	356.08	-156.07
7in Casing Intermediate	16.00	7905.00	7889.00	16.00	7549.46	0.00	0.00	350.09	-156.35
6.125in Open Hole	7905.00	12041.00	4136.00	7549.46	7481.76	350.09	-156.35	4481.87	-126.38



# Actual Wellpath Report

MARRS 2N-28HZ AWP

Page 5 of 6



## REFERENCE WELLPATH IDENTIFICATION

Operator	KERR-MCGEE OIL & GAS ONSHORE LP	Slot	SLOT#01 MARRS 2N-28HZ (275'FSL & 1874'FEL, SEC.28)
Area	COLORADO	Well	MARRS 2N-28HZ
Field	WELD COUNTY (KERR MCGEE)	Wellbore	MARRS 2N-28HZ AWB
Facility	SEC.28-T1N-R66W		

## TARGETS

Name	MD [ft]	TVD [ft]	North [ft]	East [ft]	Grid East [US ft]	Grid North [US ft]	Latitude	Longitude	Shape
MARRS PAD SECTION LINES		-1.00	0.00	0.00	3201832.76	1249388.96	40°00'56.549"N	104°46'45.804"W	polygon
MARRS PAD HARDLINES (460' SETBACKS)		7461.00	0.00	0.00	3201832.76	1249388.96	40°00'56.549"N	104°46'45.804"W	polygon
MARRS 2N-28HZ BHL ON PLAT (460'FNL & 1980'FEL, REV-2)		7487.00	4555.02	-117.31	3201678.44	1253942.71	40°01'41.563"N	104°46'47.312"W	point
MARRS 2N-28HZ BHL ON PLAT (460'FNL & 1980'FEL, REV-3)		7557.00	4555.02	-117.31	3201678.44	1253942.71	40°01'41.563"N	104°46'47.312"W	point

## WELLPATH COMPOSITION - Ref Wellbore: MARRS 2N-28HZ AWB Ref Wellpath: MARRS 2N-28HZ AWP

Start MD [ft]	End MD [ft]	Positional Uncertainty Model	Log Name/Comment	Wellbore
16.00	1290.00	ISCWSA MWD, Rev. 2 (Standard)	SURFACE SURVEYS <50-1290>	MARRS 2N-28HZ AWB
1290.00	7904.00	NaviTrak (Standard)	BHI MWD SURVEYS 8 3/4" HOLE <1432-7904>	MARRS 2N-28HZ AWB
7904.00	12041.00	NaviTrak (Standard)	BHI MWD SURVEYS 6 1/8" HOLE <7945-12041>	MARRS 2N-28HZ AWB
12041.00	12109.00	Blind Drilling (std)	Projection to bit	MARRS 2N-28HZ AWB



# Actual Wellpath Report

MARRS 2N-28HZ AWP

Page 6 of 6



## REFERENCE WELLPATH IDENTIFICATION

Operator	KERR-MCGEE OIL & GAS ONSHORE LP	Slot	SLOT#01 MARRS 2N-28HZ (275'FSL & 1874'FEL, SEC.28)
Area	COLORADO	Well	MARRS 2N-28HZ
Field	WELD COUNTY (KERR MCGEE)	Wellbore	MARRS 2N-28HZ AWB
Facility	SEC.28-T1N-R66W		

## WELLPATH COMMENTS

MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Comment
50.00	0.000	10.000	50.00	Begin Surface Surveys
1290.00	1.300	231.800	1289.92	Tie-Into Surface Surveys
1432.00	0.980	272.380	1431.89	Begin BHI MWD Surveys
7905.00	88.221	2.700	7549.46	7" Casing Point
12041.00	91.720	0.380	7481.76	Last BHI MWD Survey
12109.00	91.720	0.380	7479.71	Projection to Bit