



Actual Wellpath Report

FEHRN 8-32 AWP

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REFERENCE WELLPATH IDENTIFICATION			
Operator	KERR MCGEE OIL & GAS ONSHORE LP	Slot	SLOT#14 FEHRN 8-32 (1655'FNL & 1101'FEL)
Area	COLORADO	Well	FEHRN 8-32
Field	WELD COUNTY (KERR MCGEE)	Wellbore	FEHRN 8-32 AWB
Facility	SEC.32-T2N-R66W		

REPORT SETUP INFORMATION			
Projection System	NAD83 / Lambert Colorado SP, Northern Zone (501), US feet	Software System	WellArchitect® 3.0.0
North Reference	True	User	Doddanna
Scale	0.99996	Report Generated	9/8/2011 at 1:20:01 PM
Convergence at slot	0.46° East	Database/Source file	WA_Denver/FEHRN_8-32_AWB.xml

WELLPATH LOCATION						
	Local coordinates		Grid coordinates		Geographic coordinates	
	North[ft]	East[ft]	Easting[US ft]	Northing[US ft]	Latitude	Longitude
Slot Location	1311.18	509.67	3197068.79	1279083.47	40°05'50.377"N	104°47'44.002"W
Facility Reference Pt			3196569.55	1277768.35	40°05'37.420"N	104°47'50.560"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	4932.00ft
Horizontal Reference Pt	Slot	XTREME 6 (RKB) to Mean Sea Level	4932.00ft
Vertical Reference Pt	XTREME 6 (RKB)	XTREME 6 (RKB) to Mud Line at Slot (SLOT#14 FEHRN 8-32 (1655'FNL & 1101'FEL))	4932.00ft
MD Reference Pt	XTREME 6 (RKB)	Section Origin	N 0.00, E 0.00 ft
Field Vertical Reference	Mean Sea Level	Section Azimuth	126.49°



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Field	WELD COUNTY (KERR MCGEE)	Wellbore	FEHRN 8-32 AWB
Facility	SEC.32-T2N-R66W		

WELLPATH DATA (91 stations) † = interpolated/extrapolated station								
MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	DLS [°/100ft]	Comments
0.00†	0.000	104.800	0.00	0.00	0.00	0.00	0.00	
16.00	0.000	104.800	16.00	0.00	0.00	0.00	0.00	
164.00	0.300	104.800	164.00	0.36	-0.10	0.37	0.20	
255.00	0.300	143.100	255.00	0.81	-0.35	0.75	0.22	
346.00	0.300	138.600	346.00	1.27	-0.72	1.05	0.03	
439.00	0.900	123.100	438.99	2.24	-1.30	1.82	0.66	
529.00	2.900	120.600	528.94	5.21	-2.85	4.37	2.22	
620.00	3.200	94.300	619.81	9.65	-4.21	8.89	1.56	
706.00	5.100	95.700	705.58	14.96	-4.77	15.09	2.21	
797.00	7.300	98.500	796.05	23.54	-6.02	24.83	2.44	
859.00	9.000	101.300	857.42	31.41	-7.56	33.48	2.81	
991.00	8.400	117.800	987.92	50.29	-14.08	52.14	1.94	
1077.00	10.400	131.200	1072.77	64.24	-22.12	63.54	3.43	
1168.00	10.700	143.000	1162.24	80.52	-34.28	74.80	2.39	
1257.00	11.500	139.300	1249.58	97.10	-47.61	85.56	1.20	
1347.00	13.700	134.300	1337.41	116.41	-61.85	99.04	2.73	
1436.00	15.700	133.300	1423.49	138.81	-77.47	115.35	2.27	
1525.00	17.200	130.800	1508.85	163.89	-94.33	134.08	1.86	
1614.00	17.300	128.700	1593.84	190.23	-111.20	154.36	0.71	
1704.00	17.500	127.700	1679.72	217.13	-127.85	175.51	0.40	
1794.00	16.500	127.700	1765.79	243.44	-143.94	196.33	1.11	
1884.00	16.000	128.400	1852.20	268.62	-159.46	216.17	0.60	
1973.00	16.400	127.300	1937.66	293.44	-174.69	235.77	0.57	
2063.00	15.600	126.600	2024.17	318.24	-189.61	255.60	0.91	
2152.00	16.700	128.700	2109.66	342.99	-204.74	275.18	1.40	
2242.00	15.200	128.400	2196.19	367.71	-220.15	294.52	1.67	
2332.00	15.500	125.900	2282.98	391.52	-234.53	313.51	0.81	
2419.00	15.400	125.200	2366.84	414.70	-248.01	332.37	0.24	
2509.00	13.800	126.200	2453.93	437.38	-261.24	350.80	1.80	
2599.00	12.600	123.400	2541.55	457.92	-272.98	367.65	1.51	
2688.00	10.800	123.100	2628.70	475.93	-282.88	382.74	2.02	
2777.00	9.000	122.400	2716.37	491.20	-291.16	395.61	2.03	
2866.00	8.200	119.600	2804.37	504.45	-298.03	407.01	1.01	
2956.00	7.500	118.500	2893.53	516.64	-304.00	417.75	0.80	
3045.00	6.900	117.100	2981.82	527.66	-309.21	427.61	0.70	
3134.00	6.200	115.700	3070.24	537.66	-313.73	436.70	0.81	
3225.00	4.700	119.300	3160.83	546.19	-317.68	444.38	1.69	
3315.00	3.300	99.900	3250.61	552.16	-319.93	450.15	2.14	
3404.00	1.500	99.500	3339.53	555.49	-320.57	453.82	2.02	
3493.00	0.600	42.200	3428.52	556.57	-320.41	455.28	1.44	
3583.00	0.600	8.100	3518.51	556.40	-319.60	455.67	0.39	
3671.00	0.400	8.800	3606.51	556.03	-318.84	455.78	0.23	
3760.00	0.400	312.200	3695.51	555.58	-318.32	455.60	0.43	
3849.00	0.600	263.000	3784.50	554.93	-318.17	454.90	0.51	
3938.00	1.200	248.200	3873.49	554.11	-318.57	453.58	0.72	



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Area	COLORADO	Well	FEHRN 8-32
Field	WELD COUNTY (KERR MCGEE)	Wellbore	FEHRN 8-32 AWB
Facility	SEC.32-T2N-R66W		

WELLPATH DATA (91 stations)								
MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	DLS [°/100ft]	Comments
4026.00	1.300	247.200	3961.47	553.11	-319.30	451.80	0.12	
4115.00	1.200	241.200	4050.45	552.21	-320.14	450.05	0.18	
4204.00	1.100	248.900	4139.43	551.36	-320.90	448.44	0.21	
4293.00	1.100	238.700	4228.42	550.58	-321.65	446.91	0.22	
4426.00	1.300	243.000	4361.39	549.42	-323.00	444.48	0.16	
4562.00	1.500	251.800	4497.35	547.71	-324.25	441.41	0.22	
4694.00	1.500	259.100	4629.30	545.54	-325.12	438.07	0.14	
4828.00	2.700	218.700	4763.22	544.23	-327.92	434.38	1.37	
4917.00	1.200	263.400	4852.17	543.47	-329.66	432.14	2.28	
5006.00	1.100	277.100	4941.15	542.04	-329.66	430.37	0.33	
5096.00	1.100	258.100	5031.13	540.72	-329.73	428.66	0.40	
5185.00	1.300	252.000	5120.11	539.56	-330.22	426.87	0.27	
5274.00	1.100	309.400	5209.10	538.12	-329.99	425.25	1.31	
5364.00	1.100	267.600	5299.08	536.59	-329.48	423.72	0.87	
5455.00	1.200	250.300	5390.06	535.38	-329.83	421.95	0.40	
5544.00	0.600	257.400	5479.05	534.55	-330.25	420.62	0.68	
5632.00	0.800	270.000	5567.04	533.76	-330.35	419.55	0.29	
5723.00	1.100	270.700	5658.03	532.54	-330.34	418.04	0.33	
5810.00	1.500	7.400	5745.02	531.31	-329.20	417.35	2.25	
5900.00	1.300	4.600	5834.99	530.19	-327.02	417.59	0.23	
5991.00	1.900	83.700	5925.96	530.76	-325.82	419.17	2.30	
6079.00	1.800	83.700	6013.92	532.84	-325.51	421.99	0.11	
6166.00	1.500	82.700	6100.88	534.67	-325.21	424.48	0.35	
6257.00	1.400	80.900	6191.85	536.30	-324.89	426.76	0.12	
6345.00	1.200	85.500	6279.83	537.75	-324.64	428.74	0.26	
6436.00	0.900	85.800	6370.81	539.01	-324.52	430.40	0.33	
6525.00	0.700	43.600	6459.81	539.61	-324.07	431.48	0.68	
6615.00	0.900	32.000	6549.80	539.62	-323.08	432.23	0.28	
6702.00	0.700	27.500	6636.79	539.49	-322.02	432.84	0.24	
6793.00	0.600	70.700	6727.78	539.67	-321.37	433.54	0.54	
6883.00	0.500	101.300	6817.78	540.29	-321.29	434.37	0.34	
6972.00	0.700	98.100	6906.77	541.12	-321.45	435.29	0.23	
7059.00	1.400	78.800	6993.76	542.30	-321.32	436.86	0.89	
7145.00	1.100	89.000	7079.74	543.66	-321.10	438.72	0.43	
7234.00	1.000	93.200	7168.72	544.99	-321.13	440.35	0.14	
7325.00	0.500	101.600	7259.72	546.01	-321.25	441.53	0.56	
7413.00	0.500	137.800	7347.71	546.74	-321.61	442.16	0.35	
7504.00	0.800	143.800	7438.71	547.73	-322.42	442.80	0.34	
7592.00	0.700	151.900	7526.70	548.81	-323.39	443.42	0.17	
7683.00	0.900	136.400	7617.69	550.01	-324.40	444.17	0.32	
7771.00	0.900	141.700	7705.68	551.36	-325.44	445.08	0.09	
7860.00	0.900	145.200	7794.67	552.70	-326.56	445.91	0.06	
7950.00	1.200	157.200	7884.65	554.18	-328.01	446.68	0.41	
8039.00	1.200	150.500	7973.63	555.83	-329.68	447.50	0.16	
8109.00	1.000	158.600	8043.62	557.02	-330.89	448.08	0.36	LAST BHI MWD SURVEY



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Area	COLORADO	Well	FEHRN 8-32
Field	WELD COUNTY (KERR MCGEE)	Wellbore	FEHRN 8-32 AWP
Facility	SEC.32-T2N-R66W		

WELLPATH DATA (91 stations)								
MD [ft]	Inclination [°]	Azimuth [°]	TVD [ft]	Vert Sect [ft]	North [ft]	East [ft]	DLS [°/100ft]	Comments
8159.00	1.000	158.600	8093.61	557.75	-331.70	448.40	0.00	PROJECTION TO BIT

HOLE & CASING SECTIONS - Ref Wellbore: FEHRN 8-32 AWP Ref Wellpath: FEHRN 8-32 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	914.00	898.00	16.00	911.77	0.00	0.00	-9.67	41.64
8.625in Casing Surface	16.00	914.00	898.00	16.00	911.77	0.00	0.00	-9.67	41.64
7.875in Open Hole	914.00	8159.00	7245.00	911.77	8093.61	-9.67	41.64	-331.70	448.40

TARGETS									
Name	MD [ft]	TVD [ft]	North [ft]	East [ft]	Grid East [US ft]	Grid North [US ft]	Latitude	Longitude	Shape
FEHRN 8-32 GEO TARGET 50' RADIUS (1980'FNL & 660'FEL, REV-1)		6000.00	-326.77	441.77	3197513.13	1278760.24	40°05'47.148"N	104°47'38.317"W	circle
FEHRN 8-32 LEGAL BOX (199°N,201°S,197°E,203°W OF GEO TARGET)		6000.00	-335.77	441.76	3197513.19	1278751.23	40°05'47.059"N	104°47'38.317"W	square

WELLPATH COMPOSITION - Ref Wellbore: FEHRN 8-32 AWP Ref Wellpath: FEHRN 8-32 AWP				
Start MD [ft]	End MD [ft]	Positional Uncertainty Model	Log Name/Comment	Wellbore
16.00	859.00	NaviTrak (Standard)	BHI MWD NAVITRAK 12.25 <164-859>	FEHRN 8-32 AWP
859.00	8109.00	NaviTrak (Standard)	BHI MWD NAVITRAK 7.875 <991-8109>	FEHRN 8-32 AWP
8109.00	8159.00	Blind Drilling (std)	Projection to bit	FEHRN 8-32 AWP