

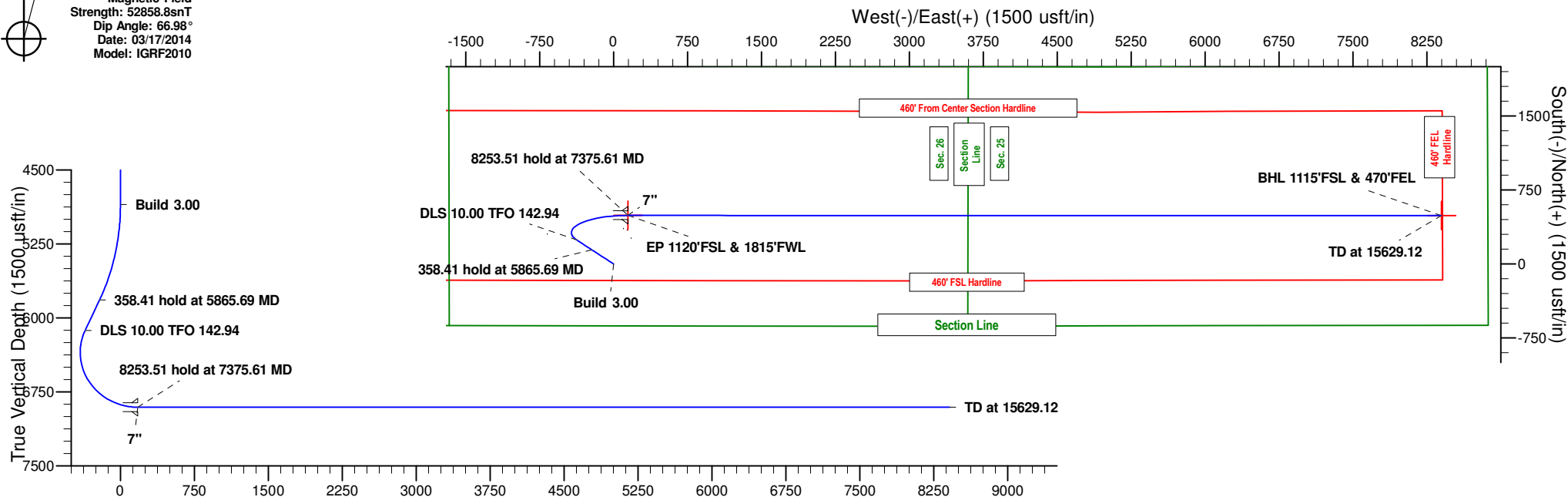


Project: Weld Co., CO
 Site: Sec.26-T6N-R7W
 Well: Kodak South FD 25-319HN
 Wellbore: Wellbore #1
 Design: Design #1
 Lat: 40° 27' 8.701 N
 Long: 104° 51' 51.649 W
 GL: 4742.60
 KB: WELL @ 4758.80usft (Original Well Elev)

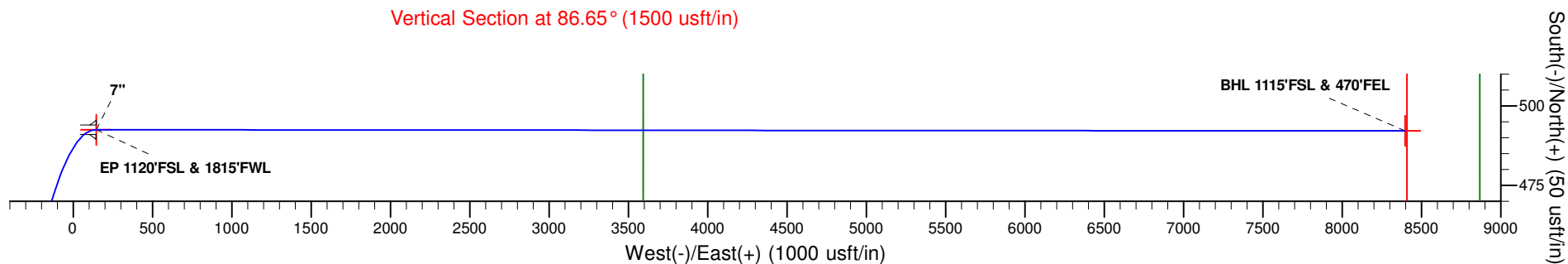


T M
 Azimuths to True North
 Magnetic North: 8.55°
 Magnetic Field
 Strength: 52858.8snT
 Dip Angle: 66.98°
 Date: 03/17/2014
 Model: IGRF2010

CASING DETAILS:
 Name Size
 MD 7" 7"
 TVD 6904.80 7375.61



Vertical Section at 86.65° (1500 usft/in)



WELLBORE TARGET DETAILS (LAT/LONG)

Name	TVD	+N/-S	+E/-W	Latitude	Longitude	Shape
BHL 1115'FSL & 470'FEL	6904.80	492.16	8398.78	40° 27' 13.550 N	104° 50' 3.001 W	Point
EP 1120'FSL & 1815'FWL	6904.80	492.55	145.27	40° 27' 13.568 N	104° 51' 49.770 W	Point

SECTION DETAILS

MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	VSect	Annotation
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
4850.00	0.00	0.00	4850.00	0.00	0.00	0.00	0.00	0.00	Build 3.00
5865.69	30.47	303.06	5818.49	143.90	-221.06	3.00	303.06	-212.27	358.41 hold at 5865.69 MD
6224.10	30.47	303.06	6127.40	243.06	-373.38	0.00	0.00	-358.52	DLS 10.00 TFO 142.94
7375.61	90.00	90.00	6904.80	492.55	145.27	10.00	142.94	173.83	8253.51 hold at 7375.61 MD
15629.12	90.00	90.00	6904.80	492.16	8398.78	0.00	0.00	8413.18	TD at 15629.12



Great Western Oil & Gas

Weld Co., CO

Sec.26-T6N-R7W

Kodak South FD 25-319HN

Wellbore #1

Plan: Design #1

Standard Planning Report

18 March, 2014



Database:	EDM 5000.1 Single User Db	Local Co-ordinate Reference:	Well Kodak South FD 25-319HN
Company:	Great Western Oil & Gas	TVD Reference:	WELL @ 4758.80usft (Original Well Elev)
Project:	Weld Co., CO	MD Reference:	WELL @ 4758.80usft (Original Well Elev)
Site:	Sec.26-T6N-R7W	North Reference:	True
Well:	Kodak South FD 25-319HN	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Design #1		

Project	Weld Co., CO		
Map System:	US State Plane 1983	System Datum:	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	Colorado Northern Zone		

Site	Sec.26-T6N-R7W				
Site Position:		Northing:	1,408,389.86 usft	Latitude:	40° 27' 9.691 N
From:	Lat/Long	Easting:	3,176,867.33 usft	Longitude:	104° 51' 52.031 W
Position Uncertainty:	0.00 usft	Slot Radius:	13-3/16 "	Grid Convergence:	0.41

Well	Kodak South FD 25-319HN					
Well Position	+N/-S	-100.20 usft	Northing:	1,408,289.88 usft	Latitude:	40° 27' 8.701 N
	+E/-W	29.50 usft	Easting:	3,176,897.55 usft	Longitude:	104° 51' 51.649 W
Position Uncertainty		0.00 usft	Wellhead Elevation:		Ground Level:	4,742.60 usft

Wellbore	Wellbore #1				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2010	03/17/14	8.55	66.98	52,859

Design	Design #1			
Audit Notes:				
Version:	Phase:	PLAN	Tie On Depth:	0.00
Vertical Section:	Depth From (TVD) (usft)	+N/-S (usft)	+E/-W (usft)	Direction (°)
	0.00	0.00	0.00	86.65

Plan Sections										
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	TFO (°)	Target
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
4,850.00	0.00	0.00	4,850.00	0.00	0.00	0.00	0.00	0.00	0.00	
5,865.69	30.47	303.06	5,818.49	143.90	-221.06	3.00	3.00	0.00	303.06	
6,224.10	30.47	303.06	6,127.40	243.06	-373.38	0.00	0.00	0.00	0.00	
7,375.61	90.00	90.00	6,904.80	492.55	145.27	10.00	5.17	12.76	142.94	EP 1120'FSL & 1815'
15,629.12	90.00	90.00	6,904.80	492.16	8,398.78	0.00	0.00	0.00	0.00	BHL 1115'FSL & 470'

Database:	EDM 5000.1 Single User Db	Local Co-ordinate Reference:	Well Kodak South FD 25-319HN
Company:	Great Western Oil & Gas	TVD Reference:	WELL @ 4758.80usft (Original Well Elev)
Project:	Weld Co., CO	MD Reference:	WELL @ 4758.80usft (Original Well Elev)
Site:	Sec.26-T6N-R7W	North Reference:	True
Well:	Kodak South FD 25-319HN	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Design #1		

Planned Survey									
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
100.00	0.00	0.00	100.00	0.00	0.00	0.00	0.00	0.00	0.00
200.00	0.00	0.00	200.00	0.00	0.00	0.00	0.00	0.00	0.00
300.00	0.00	0.00	300.00	0.00	0.00	0.00	0.00	0.00	0.00
400.00	0.00	0.00	400.00	0.00	0.00	0.00	0.00	0.00	0.00
500.00	0.00	0.00	500.00	0.00	0.00	0.00	0.00	0.00	0.00
600.00	0.00	0.00	600.00	0.00	0.00	0.00	0.00	0.00	0.00
700.00	0.00	0.00	700.00	0.00	0.00	0.00	0.00	0.00	0.00
800.00	0.00	0.00	800.00	0.00	0.00	0.00	0.00	0.00	0.00
900.00	0.00	0.00	900.00	0.00	0.00	0.00	0.00	0.00	0.00
1,000.00	0.00	0.00	1,000.00	0.00	0.00	0.00	0.00	0.00	0.00
1,100.00	0.00	0.00	1,100.00	0.00	0.00	0.00	0.00	0.00	0.00
1,200.00	0.00	0.00	1,200.00	0.00	0.00	0.00	0.00	0.00	0.00
1,300.00	0.00	0.00	1,300.00	0.00	0.00	0.00	0.00	0.00	0.00
1,400.00	0.00	0.00	1,400.00	0.00	0.00	0.00	0.00	0.00	0.00
1,500.00	0.00	0.00	1,500.00	0.00	0.00	0.00	0.00	0.00	0.00
1,600.00	0.00	0.00	1,600.00	0.00	0.00	0.00	0.00	0.00	0.00
1,700.00	0.00	0.00	1,700.00	0.00	0.00	0.00	0.00	0.00	0.00
1,800.00	0.00	0.00	1,800.00	0.00	0.00	0.00	0.00	0.00	0.00
1,900.00	0.00	0.00	1,900.00	0.00	0.00	0.00	0.00	0.00	0.00
2,000.00	0.00	0.00	2,000.00	0.00	0.00	0.00	0.00	0.00	0.00
2,100.00	0.00	0.00	2,100.00	0.00	0.00	0.00	0.00	0.00	0.00
2,200.00	0.00	0.00	2,200.00	0.00	0.00	0.00	0.00	0.00	0.00
2,300.00	0.00	0.00	2,300.00	0.00	0.00	0.00	0.00	0.00	0.00
2,400.00	0.00	0.00	2,400.00	0.00	0.00	0.00	0.00	0.00	0.00
2,500.00	0.00	0.00	2,500.00	0.00	0.00	0.00	0.00	0.00	0.00
2,600.00	0.00	0.00	2,600.00	0.00	0.00	0.00	0.00	0.00	0.00
2,700.00	0.00	0.00	2,700.00	0.00	0.00	0.00	0.00	0.00	0.00
2,800.00	0.00	0.00	2,800.00	0.00	0.00	0.00	0.00	0.00	0.00
2,900.00	0.00	0.00	2,900.00	0.00	0.00	0.00	0.00	0.00	0.00
3,000.00	0.00	0.00	3,000.00	0.00	0.00	0.00	0.00	0.00	0.00
3,100.00	0.00	0.00	3,100.00	0.00	0.00	0.00	0.00	0.00	0.00
3,200.00	0.00	0.00	3,200.00	0.00	0.00	0.00	0.00	0.00	0.00
3,300.00	0.00	0.00	3,300.00	0.00	0.00	0.00	0.00	0.00	0.00
3,400.00	0.00	0.00	3,400.00	0.00	0.00	0.00	0.00	0.00	0.00
3,500.00	0.00	0.00	3,500.00	0.00	0.00	0.00	0.00	0.00	0.00
3,600.00	0.00	0.00	3,600.00	0.00	0.00	0.00	0.00	0.00	0.00
3,700.00	0.00	0.00	3,700.00	0.00	0.00	0.00	0.00	0.00	0.00
3,800.00	0.00	0.00	3,800.00	0.00	0.00	0.00	0.00	0.00	0.00
3,900.00	0.00	0.00	3,900.00	0.00	0.00	0.00	0.00	0.00	0.00
4,000.00	0.00	0.00	4,000.00	0.00	0.00	0.00	0.00	0.00	0.00
4,100.00	0.00	0.00	4,100.00	0.00	0.00	0.00	0.00	0.00	0.00
4,200.00	0.00	0.00	4,200.00	0.00	0.00	0.00	0.00	0.00	0.00
4,300.00	0.00	0.00	4,300.00	0.00	0.00	0.00	0.00	0.00	0.00
4,400.00	0.00	0.00	4,400.00	0.00	0.00	0.00	0.00	0.00	0.00
4,500.00	0.00	0.00	4,500.00	0.00	0.00	0.00	0.00	0.00	0.00
4,600.00	0.00	0.00	4,600.00	0.00	0.00	0.00	0.00	0.00	0.00
4,700.00	0.00	0.00	4,700.00	0.00	0.00	0.00	0.00	0.00	0.00
4,800.00	0.00	0.00	4,800.00	0.00	0.00	0.00	0.00	0.00	0.00
4,850.00	0.00	0.00	4,850.00	0.00	0.00	0.00	0.00	0.00	0.00
Build 3.00									
4,900.00	1.50	303.06	4,899.99	0.36	-0.55	-0.53	3.00	3.00	0.00
5,000.00	4.50	303.06	4,999.85	3.21	-4.93	-4.74	3.00	3.00	0.00
5,100.00	7.50	303.06	5,099.29	8.91	-13.69	-13.15	3.00	3.00	0.00

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Project:	Weld Co., CO	MD Reference:	WELL @ 4758.80usft (Original Well Elev)
Site:	Sec.26-T6N-R7W	North Reference:	True
Well:	Kodak South FD 25-319HN	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Design #1		

Planned Survey									
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
5,200.00	10.50	303.06	5,198.04	17.45	-26.80	-25.74	3.00	3.00	0.00
5,300.00	13.50	303.06	5,295.85	28.79	-44.22	-42.47	3.00	3.00	0.00
5,400.00	16.50	303.06	5,392.43	42.91	-65.91	-63.29	3.00	3.00	0.00
5,500.00	19.50	303.06	5,487.52	59.76	-91.81	-88.16	3.00	3.00	0.00
5,600.00	22.50	303.06	5,580.87	79.31	-121.84	-116.99	3.00	3.00	0.00
5,700.00	25.50	303.06	5,672.22	101.50	-155.92	-149.72	3.00	3.00	0.00
5,800.00	28.50	303.06	5,761.31	126.26	-193.97	-186.25	3.00	3.00	0.00
5,865.69	30.47	303.06	5,818.49	143.90	-221.06	-212.27	3.00	3.00	0.00
358.41 hold at 5865.69 MD									
5,900.00	30.47	303.06	5,848.06	153.39	-235.64	-226.27	0.00	0.00	0.00
6,000.00	30.47	303.06	5,934.25	181.06	-278.14	-267.07	0.00	0.00	0.00
6,100.00	30.47	303.06	6,020.43	208.73	-320.64	-307.88	0.00	0.00	0.00
6,200.00	30.47	303.06	6,106.62	236.39	-363.14	-348.69	0.00	0.00	0.00
6,224.10	30.47	303.06	6,127.40	243.06	-373.38	-358.52	0.00	0.00	0.00
DLS 10.00 TFO 142.94									
6,250.00	28.44	306.34	6,149.95	250.30	-383.86	-368.56	10.00	-7.83	12.66
6,300.00	24.80	314.00	6,194.65	264.65	-401.00	-384.83	10.00	-7.29	15.32
6,350.00	21.66	323.91	6,240.61	279.40	-413.99	-396.93	10.00	-6.27	19.81
6,400.00	19.29	336.53	6,287.47	294.44	-422.72	-404.77	10.00	-4.75	25.24
6,450.00	17.97	351.68	6,334.88	309.65	-427.13	-408.28	10.00	-2.63	30.30
6,500.00	17.96	7.94	6,382.47	324.93	-427.18	-407.44	10.00	-0.03	32.52
6,550.00	19.24	23.14	6,429.89	340.15	-422.88	-402.25	10.00	2.57	30.40
6,600.00	21.60	35.82	6,476.77	355.19	-414.25	-392.76	10.00	4.71	25.37
6,650.00	24.72	45.79	6,522.75	369.95	-401.36	-379.03	10.00	6.24	19.93
6,700.00	28.35	53.50	6,567.49	384.31	-384.31	-361.17	10.00	7.27	15.42
6,750.00	32.32	59.52	6,610.64	398.16	-363.24	-339.32	10.00	7.95	12.04
6,800.00	36.53	64.32	6,651.89	411.40	-338.29	-313.65	10.00	8.41	9.60
6,850.00	40.89	68.24	6,690.90	423.92	-309.66	-284.34	10.00	8.72	7.84
6,900.00	45.36	71.52	6,727.39	435.63	-277.58	-251.62	10.00	8.94	6.56
6,950.00	49.91	74.33	6,761.08	446.44	-242.27	-215.74	10.00	9.10	5.61
7,000.00	54.52	76.78	6,791.71	456.27	-204.01	-176.97	10.00	9.22	4.90
7,050.00	59.17	78.96	6,819.05	465.04	-163.10	-135.61	10.00	9.31	4.37
7,100.00	63.86	80.94	6,842.89	472.69	-119.84	-91.98	10.00	9.38	3.96
7,150.00	68.57	82.77	6,863.05	479.16	-74.56	-46.40	10.00	9.43	3.65
7,200.00	73.30	84.48	6,879.38	484.40	-27.61	0.78	10.00	9.46	3.42
7,250.00	78.05	86.11	6,891.74	488.36	20.66	49.20	10.00	9.49	3.26
7,300.00	82.80	87.68	6,900.06	491.03	69.88	98.48	10.00	9.51	3.14
7,350.00	87.56	89.22	6,904.26	492.37	119.67	148.27	10.00	9.52	3.08
7,375.61	90.00	90.00	6,904.80	492.55	145.27	173.83	10.00	9.52	3.06
8253.51 hold at 7375.61 MD									
7,400.00	90.00	90.00	6,904.80	492.55	169.66	198.18	0.00	0.00	0.00
7,500.00	90.00	90.00	6,904.80	492.54	269.66	298.01	0.00	0.00	0.00
7,600.00	90.00	90.00	6,904.80	492.54	369.66	397.84	0.00	0.00	0.00
7,700.00	90.00	90.00	6,904.80	492.53	469.66	497.67	0.00	0.00	0.00
7,800.00	90.00	90.00	6,904.80	492.53	569.66	597.49	0.00	0.00	0.00
7,900.00	90.00	90.00	6,904.80	492.52	669.66	697.32	0.00	0.00	0.00
8,000.00	90.00	90.00	6,904.80	492.52	769.66	797.15	0.00	0.00	0.00
8,100.00	90.00	90.00	6,904.80	492.51	869.66	896.98	0.00	0.00	0.00
8,200.00	90.00	90.00	6,904.80	492.51	969.66	996.81	0.00	0.00	0.00
8,300.00	90.00	90.00	6,904.80	492.50	1,069.66	1,096.64	0.00	0.00	0.00
8,400.00	90.00	90.00	6,904.80	492.50	1,169.66	1,196.47	0.00	0.00	0.00
8,500.00	90.00	90.00	6,904.80	492.49	1,269.66	1,296.29	0.00	0.00	0.00
8,600.00	90.00	90.00	6,904.80	492.49	1,369.66	1,396.12	0.00	0.00	0.00

Database:	EDM 5000.1 Single User Db	Local Co-ordinate Reference:	Well Kodak South FD 25-319HN
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Project:	Weld Co., CO	MD Reference:	WELL @ 4758.80usft (Original Well Elev)
Site:	Sec.26-T6N-R7W	North Reference:	True
Well:	Kodak South FD 25-319HN	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Design #1		

Planned Survey										
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	
8,700.00	90.00	90.00	6,904.80	492.48	1,469.66	1,495.95	0.00	0.00	0.00	
8,800.00	90.00	90.00	6,904.80	492.48	1,569.66	1,595.78	0.00	0.00	0.00	
8,900.00	90.00	90.00	6,904.80	492.48	1,669.66	1,695.61	0.00	0.00	0.00	
9,000.00	90.00	90.00	6,904.80	492.47	1,769.66	1,795.44	0.00	0.00	0.00	
9,100.00	90.00	90.00	6,904.80	492.47	1,869.66	1,895.27	0.00	0.00	0.00	
9,200.00	90.00	90.00	6,904.80	492.46	1,969.66	1,995.09	0.00	0.00	0.00	
9,300.00	90.00	90.00	6,904.80	492.46	2,069.66	2,094.92	0.00	0.00	0.00	
9,400.00	90.00	90.00	6,904.80	492.45	2,169.66	2,194.75	0.00	0.00	0.00	
9,500.00	90.00	90.00	6,904.80	492.45	2,269.66	2,294.58	0.00	0.00	0.00	
9,600.00	90.00	90.00	6,904.80	492.44	2,369.66	2,394.41	0.00	0.00	0.00	
9,700.00	90.00	90.00	6,904.80	492.44	2,469.66	2,494.24	0.00	0.00	0.00	
9,800.00	90.00	90.00	6,904.80	492.43	2,569.66	2,594.06	0.00	0.00	0.00	
9,900.00	90.00	90.00	6,904.80	492.43	2,669.66	2,693.89	0.00	0.00	0.00	
10,000.00	90.00	90.00	6,904.80	492.42	2,769.66	2,793.72	0.00	0.00	0.00	
10,100.00	90.00	90.00	6,904.80	492.42	2,869.66	2,893.55	0.00	0.00	0.00	
10,200.00	90.00	90.00	6,904.80	492.41	2,969.66	2,993.38	0.00	0.00	0.00	
10,300.00	90.00	90.00	6,904.80	492.41	3,069.66	3,093.21	0.00	0.00	0.00	
10,400.00	90.00	90.00	6,904.80	492.40	3,169.66	3,193.04	0.00	0.00	0.00	
10,500.00	90.00	90.00	6,904.80	492.40	3,269.66	3,292.86	0.00	0.00	0.00	
10,600.00	90.00	90.00	6,904.80	492.39	3,369.66	3,392.69	0.00	0.00	0.00	
10,700.00	90.00	90.00	6,904.80	492.39	3,469.66	3,492.52	0.00	0.00	0.00	
10,800.00	90.00	90.00	6,904.80	492.39	3,569.66	3,592.35	0.00	0.00	0.00	
10,900.00	90.00	90.00	6,904.80	492.38	3,669.66	3,692.18	0.00	0.00	0.00	
11,000.00	90.00	90.00	6,904.80	492.38	3,769.66	3,792.01	0.00	0.00	0.00	
11,100.00	90.00	90.00	6,904.80	492.37	3,869.66	3,891.83	0.00	0.00	0.00	
11,200.00	90.00	90.00	6,904.80	492.37	3,969.66	3,991.66	0.00	0.00	0.00	
11,300.00	90.00	90.00	6,904.80	492.36	4,069.66	4,091.49	0.00	0.00	0.00	
11,400.00	90.00	90.00	6,904.80	492.36	4,169.66	4,191.32	0.00	0.00	0.00	
11,500.00	90.00	90.00	6,904.80	492.35	4,269.66	4,291.15	0.00	0.00	0.00	
11,600.00	90.00	90.00	6,904.80	492.35	4,369.66	4,390.98	0.00	0.00	0.00	
11,700.00	90.00	90.00	6,904.80	492.34	4,469.66	4,490.81	0.00	0.00	0.00	
11,800.00	90.00	90.00	6,904.80	492.34	4,569.66	4,590.63	0.00	0.00	0.00	
11,900.00	90.00	90.00	6,904.80	492.33	4,669.66	4,690.46	0.00	0.00	0.00	
12,000.00	90.00	90.00	6,904.80	492.33	4,769.66	4,790.29	0.00	0.00	0.00	
12,100.00	90.00	90.00	6,904.80	492.32	4,869.66	4,890.12	0.00	0.00	0.00	
12,200.00	90.00	90.00	6,904.80	492.32	4,969.66	4,989.95	0.00	0.00	0.00	
12,300.00	90.00	90.00	6,904.80	492.31	5,069.66	5,089.78	0.00	0.00	0.00	
12,400.00	90.00	90.00	6,904.80	492.31	5,169.66	5,189.60	0.00	0.00	0.00	
12,500.00	90.00	90.00	6,904.80	492.30	5,269.66	5,289.43	0.00	0.00	0.00	
12,600.00	90.00	90.00	6,904.80	492.30	5,369.66	5,389.26	0.00	0.00	0.00	
12,700.00	90.00	90.00	6,904.80	492.29	5,469.66	5,489.09	0.00	0.00	0.00	
12,800.00	90.00	90.00	6,904.80	492.29	5,569.66	5,588.92	0.00	0.00	0.00	
12,900.00	90.00	90.00	6,904.80	492.29	5,669.66	5,688.75	0.00	0.00	0.00	
13,000.00	90.00	90.00	6,904.80	492.28	5,769.66	5,788.58	0.00	0.00	0.00	
13,100.00	90.00	90.00	6,904.80	492.28	5,869.66	5,888.40	0.00	0.00	0.00	
13,200.00	90.00	90.00	6,904.80	492.27	5,969.66	5,988.23	0.00	0.00	0.00	
13,300.00	90.00	90.00	6,904.80	492.27	6,069.66	6,088.06	0.00	0.00	0.00	
13,400.00	90.00	90.00	6,904.80	492.26	6,169.66	6,187.89	0.00	0.00	0.00	
13,500.00	90.00	90.00	6,904.80	492.26	6,269.66	6,287.72	0.00	0.00	0.00	
13,600.00	90.00	90.00	6,904.80	492.25	6,369.66	6,387.55	0.00	0.00	0.00	
13,700.00	90.00	90.00	6,904.80	492.25	6,469.66	6,487.38	0.00	0.00	0.00	
13,800.00	90.00	90.00	6,904.80	492.24	6,569.66	6,587.20	0.00	0.00	0.00	
13,900.00	90.00	90.00	6,904.80	492.24	6,669.66	6,687.03	0.00	0.00	0.00	
14,000.00	90.00	90.00	6,904.80	492.23	6,769.66	6,786.86	0.00	0.00	0.00	

Database:	EDM 5000.1 Single User Db	Local Co-ordinate Reference:	Well Kodak South FD 25-319HN
Company:	Great Western Oil & Gas	TVD Reference:	WELL @ 4758.80usft (Original Well Elev)
Project:	Weld Co., CO	MD Reference:	WELL @ 4758.80usft (Original Well Elev)
Site:	Sec.26-T6N-R7W	North Reference:	True
Well:	Kodak South FD 25-319HN	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Design #1		

Planned Survey										
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	
14,100.00	90.00	90.00	6,904.80	492.23	6,869.66	6,886.69	0.00	0.00	0.00	
14,200.00	90.00	90.00	6,904.80	492.22	6,969.66	6,986.52	0.00	0.00	0.00	
14,300.00	90.00	90.00	6,904.80	492.22	7,069.66	7,086.35	0.00	0.00	0.00	
14,400.00	90.00	90.00	6,904.80	492.21	7,169.66	7,186.17	0.00	0.00	0.00	
14,500.00	90.00	90.00	6,904.80	492.21	7,269.66	7,286.00	0.00	0.00	0.00	
14,600.00	90.00	90.00	6,904.80	492.20	7,369.66	7,385.83	0.00	0.00	0.00	
14,700.00	90.00	90.00	6,904.80	492.20	7,469.66	7,485.66	0.00	0.00	0.00	
14,800.00	90.00	90.00	6,904.80	492.19	7,569.66	7,585.49	0.00	0.00	0.00	
14,900.00	90.00	90.00	6,904.80	492.19	7,669.66	7,685.32	0.00	0.00	0.00	
15,000.00	90.00	90.00	6,904.80	492.19	7,769.66	7,785.15	0.00	0.00	0.00	
15,100.00	90.00	90.00	6,904.80	492.18	7,869.66	7,884.97	0.00	0.00	0.00	
15,200.00	90.00	90.00	6,904.80	492.18	7,969.66	7,984.80	0.00	0.00	0.00	
15,300.00	90.00	90.00	6,904.80	492.17	8,069.66	8,084.63	0.00	0.00	0.00	
15,400.00	90.00	90.00	6,904.80	492.17	8,169.66	8,184.46	0.00	0.00	0.00	
15,500.00	90.00	90.00	6,904.80	492.16	8,269.66	8,284.29	0.00	0.00	0.00	
15,600.00	90.00	90.00	6,904.80	492.16	8,369.66	8,384.12	0.00	0.00	0.00	
15,629.12	90.00	90.00	6,904.80	492.16	8,398.78	8,413.18	0.00	0.00	0.00	
TD at 15629.12										

Design Targets										
Target Name	Dip Angle (°)	Dip Dir. (°)	TVD (usft)	+N/-S (usft)	+E/-W (usft)	Northing (usft)	Easting (usft)	Latitude		Longitude
- hit/miss target										
- Shape										
BHL 1115'FSL & 470'FE	0.00	0.00	6,904.80	492.16	8,398.78	1,408,842.23	3,185,292.58	40° 27' 13.550 N		104° 50' 3.001 W
- plan hits target center										
- Point										
EP 1120'FSL & 1815'FW	0.00	0.00	6,904.80	492.55	145.27	1,408,783.45	3,177,039.28	40° 27' 13.568 N		104° 51' 49.770 W
- plan hits target center										
- Point										

Casing Points						Casing Diameter (")	Hole Diameter (")
Measured Depth (usft)	Vertical Depth (usft)	Name					
7,375.61	6,904.80	7"				7	7-1/2

Plan Annotations					
Measured Depth (usft)	Vertical Depth (usft)	Local Coordinates		Comment	
		+N/-S (usft)	+E/-W (usft)		
4,850.00	4,850.00	0.00	0.00	Build 3.00	
5,865.69	5,818.49	143.90	-221.06	358.41 hold at 5865.69 MD	
6,224.10	6,127.40	243.06	-373.38	DLS 10.00 TFO 142.94	
7,375.61	6,904.80	492.55	145.27	8253.51 hold at 7375.61 MD	
15,629.12	6,904.80	492.16	8,398.78	TD at 15629.12	



Precision
Directional Services

Great Western Oil & Gas

Weld Co., CO

Sec.26-T6N-R7W

Kodak South FD 25-319HN

Wellbore #1

Design #1

Anticollision Summary Report

18 March, 2014



Company:	Great Western Oil & Gas	Local Co-ordinate Reference:	Well Kodak South FD 25-319HN
Project:	Weld Co., CO	TVD Reference:	WELL @ 4758.80usft (Original Well Elev)
Reference Site:	Sec.26-T6N-R7W	MD Reference:	WELL @ 4758.80usft (Original Well Elev)
Site Error:	0.00 usft	North Reference:	True
Reference Well:	Kodak South FD 25-319HN	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	Wellbore #1	Database:	EDM 5000.1 Single User Db
Reference Design:	Design #1	Offset TVD Reference:	Offset Datum

Reference	Design #1		
Filter type:	NO GLOBAL FILTER: Using user defined selection & filtering criteria		
Interpolation Method:	Stations	Error Model:	ISCWSA
Depth Range:	Unlimited	Scan Method:	Closest Approach 3D
Results Limited by:	Maximum center-center distance of 9,999.98 usft	Error Surface:	Elliptical Conic
Warning Levels Evaluated at:	2.00 Sigma	Casing Method:	Not applied

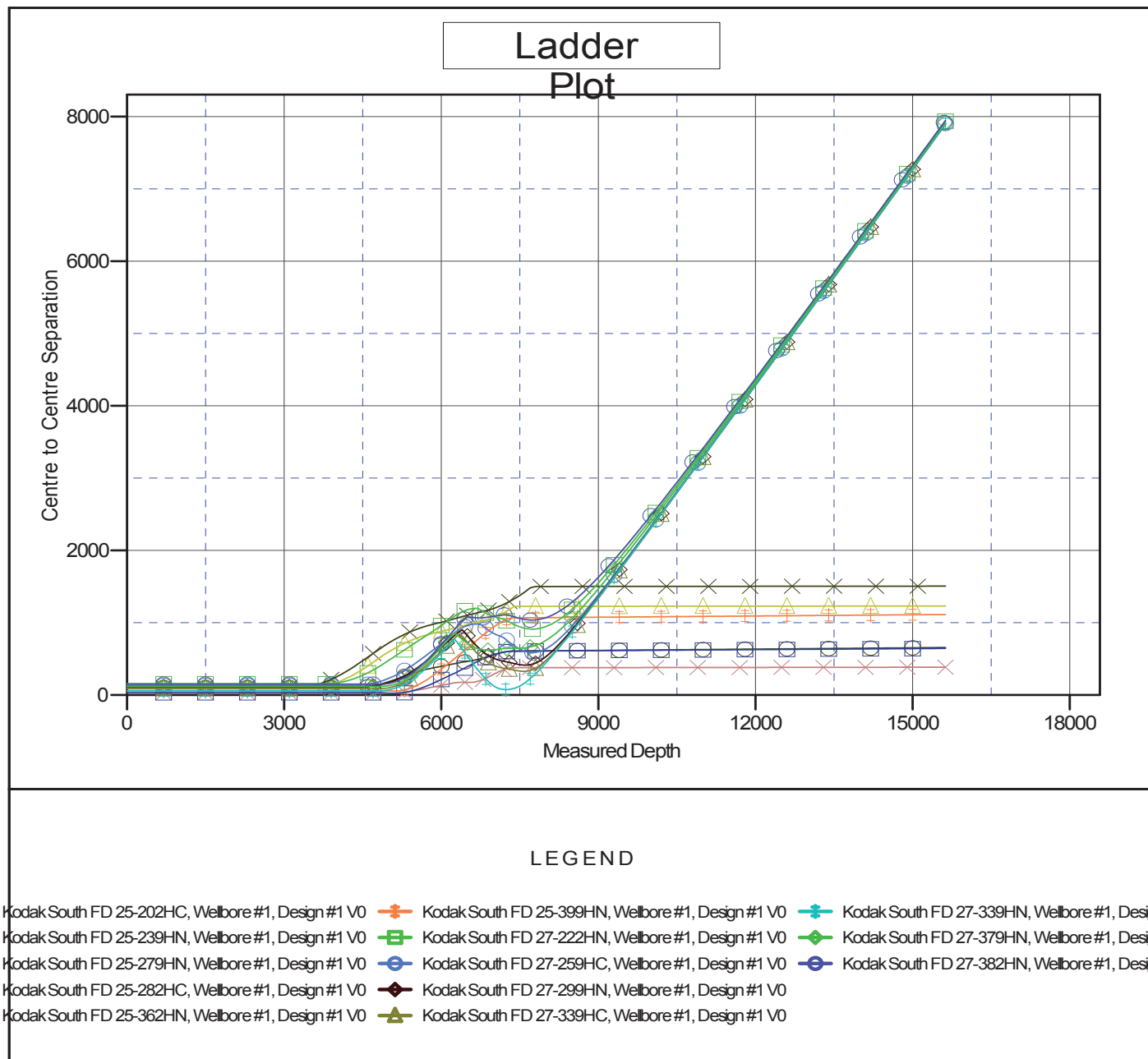
Survey Tool Program		Date	03/17/14		
From (usft)	To (usft)	Survey (Wellbore)	Tool Name	Description	
0.00	15,629.12	Design #1 (Wellbore #1)	MWD	Std MWD	

Summary						
Site Name	Reference Measured Depth (usft)	Offset Measured Depth (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Separation Factor	Warning
Sec.26-T6N-R7W						
Kodak South FD 25-202HC - Wellbore #1 - Design #1	3,200.00	3,200.00	104.44	87.77	6.265 CC, ES	
Kodak South FD 25-202HC - Wellbore #1 - Design #1	3,300.00	3,295.82	106.02	88.84	6.170 SF	
Kodak South FD 25-239HN - Wellbore #1 - Design #1	3,433.35	3,433.35	100.18	82.29	5.599 CC, ES	
Kodak South FD 25-239HN - Wellbore #1 - Design #1	3,500.00	3,497.62	100.77	82.54	5.526 SF	
Kodak South FD 25-279HN - Wellbore #1 - Design #1	4,333.51	4,333.51	104.83	82.23	4.638 CC, ES	
Kodak South FD 25-279HN - Wellbore #1 - Design #1	15,629.12	15,752.53	656.83	464.49	3.415 SF	
Kodak South FD 25-282HC - Wellbore #1 - Design #1	4,977.20	4,978.74	25.37	-0.60	0.977 Level 1, CC	
Kodak South FD 25-282HC - Wellbore #1 - Design #1	5,000.00	5,001.56	25.46	-0.64	0.976 Level 1, ES, SF	
Kodak South FD 25-362HN - Wellbore #1 - Design #1	5,121.08	5,118.80	21.93	-4.77	0.821 Level 1, CC, ES, SF	
Kodak South FD 25-399HN - Wellbore #1 - Design #1	5,102.34	5,097.11	54.61	28.04	2.055 CC, ES, SF	
Kodak South FD 27-222HN - Wellbore #1 - Design #1	3,752.39	3,752.39	156.01	136.45	7.975 CC	
Kodak South FD 27-222HN - Wellbore #1 - Design #1	3,800.00	3,798.04	156.20	136.39	7.886 ES	
Kodak South FD 27-222HN - Wellbore #1 - Design #1	3,900.00	3,891.37	159.55	139.23	7.854 SF	
Kodak South FD 27-259HC - Wellbore #1 - Design #1	4,344.45	4,344.45	134.72	112.06	5.945 CC, ES	
Kodak South FD 27-259HC - Wellbore #1 - Design #1	4,400.00	4,397.46	135.10	112.15	5.887 SF	
Kodak South FD 27-299HN - Wellbore #1 - Design #1	4,500.00	4,500.00	117.26	93.78	4.995 CC, ES	
Kodak South FD 27-299HN - Wellbore #1 - Design #1	4,600.00	4,595.95	118.46	94.47	4.938 SF	
Kodak South FD 27-339HC - Wellbore #1 - Design #1	4,850.00	4,850.00	89.61	64.30	3.541 CC, ES, SF	
Kodak South FD 27-339HN - Wellbore #1 - Design #1	4,822.23	4,822.23	60.11	34.95	2.389 CC	
Kodak South FD 27-339HN - Wellbore #1 - Design #1	4,850.00	4,849.45	60.20	34.89	2.379 ES	
Kodak South FD 27-339HN - Wellbore #1 - Design #1	7,250.00	7,298.21	75.78	37.68	1.989 SF	
Kodak South FD 27-379HN - Wellbore #1 - Design #1	4,850.00	4,850.00	119.67	94.36	4.728 CC, ES	
Kodak South FD 27-379HN - Wellbore #1 - Design #1	4,900.00	4,898.83	120.32	94.76	4.707 SF	
Kodak South FD 27-382HN - Wellbore #1 - Design #1	4,829.17	4,829.17	150.01	124.80	5.952 CC	
Kodak South FD 27-382HN - Wellbore #1 - Design #1	4,850.00	4,849.47	150.02	124.71	5.928 ES	
Kodak South FD 27-382HN - Wellbore #1 - Design #1	4,900.00	4,896.81	151.19	125.63	5.916 SF	

Company:	Great Western Oil & Gas	Local Co-ordinate Reference:	Well Kodak South FD 25-319HN
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Reference Site:	Sec.26-T6N-R7W	MD Reference:	WELL @ 4758.80usft (Original Well Elev)
Site Error:	0.00 usft	North Reference:	True
Reference Well:	Kodak South FD 25-319HN	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	Wellbore #1	Database:	EDM 5000.1 Single User Db
Reference Design:	Design #1	Offset TVD Reference:	Offset Datum

Reference Depths are relative to WELL @ 4758.80usft (Original Well E
Offset Depths are relative to Offset Datum
Central Meridian is 105° 30' 0.000 W

Coordinates are relative to: Kodak South FD 25-319HN
Coordinate System is US State Plane 1983, Colorado Northern Zone
Grid Convergence at Surface is: 0.41°



Company:	Great Western Oil & Gas	Local Co-ordinate Reference:	Well Kodak South FD 25-319HN
Project:	Weld Co., CO	TVD Reference:	WELL @ 4758.80usft (Original Well Elev)
Reference Site:	Sec.26-T6N-R7W	MD Reference:	WELL @ 4758.80usft (Original Well Elev)
Site Error:	0.00 usft	North Reference:	True
Reference Well:	Kodak South FD 25-319HN	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	Wellbore #1	Database:	EDM 5000.1 Single User Db
Reference Design:	Design #1	Offset TVD Reference:	Offset Datum

Reference Depths are relative to WELL @ 4758.80usft (Original Well E

Offset Depths are relative to Offset Datum

Central Meridian is 105° 30' 0.000 W

Coordinates are relative to: Kodak South FD 25-319HN

Coordinate System is US State Plane 1983, Colorado Northern Zone

Grid Convergence at Surface is: 0.41°

