

US ROCKIES REGION PLANNING

COLORADO NORTHERN ZONE - 83

WELD_WETHINGTON PAD

Wethington 27-7

Wethington 27-7

Plan: Wethington 27-7 (wp01)

Standard Planning Report

04 May, 2011



Project: COLORADO NORTHERN ZONE - 83
Site: WELD_WETHINGTON PAD
Well: Wethington 27-7
Wellbore: Wethington 27-7
Section:
SHL:
Design: Wethington 27-7 (wp01)
Latitude: 40.068870
Longitude: -104.820446
GL: 4902.00
KB: 15' RKB + 4902' GL @ 4917.00ft

FORMATION TOP DETAILS

TVDPath	MDPath	Formation
3277.00	3426.53	PRKM TOP
4607.00	4842.66	SX TOP
5122.00	5391.02	SHN TOP
7077.00	7412.17	NI A TOP
7417.00	7752.17	CDL TOP
7507.00	7842.17	GH TOP
7857.00	8192.17	J TOP



Azimuths to True North
Magnetic North: 8.88°

Magnetic Field
Strength: 52962.7snT
Dip Angle: 66.78°
Date: 5/3/2011
Model: IGRF2010

WELL DETAILS: Wethington 27-7

+N/-S	+E/-W	Northing	Ground Level: Easting	4902.00 Latitude	Longitude	Slot
0.00	0.00	1268663.19	3190185.37	40.068870	-104.820446	

CASING DETAILS

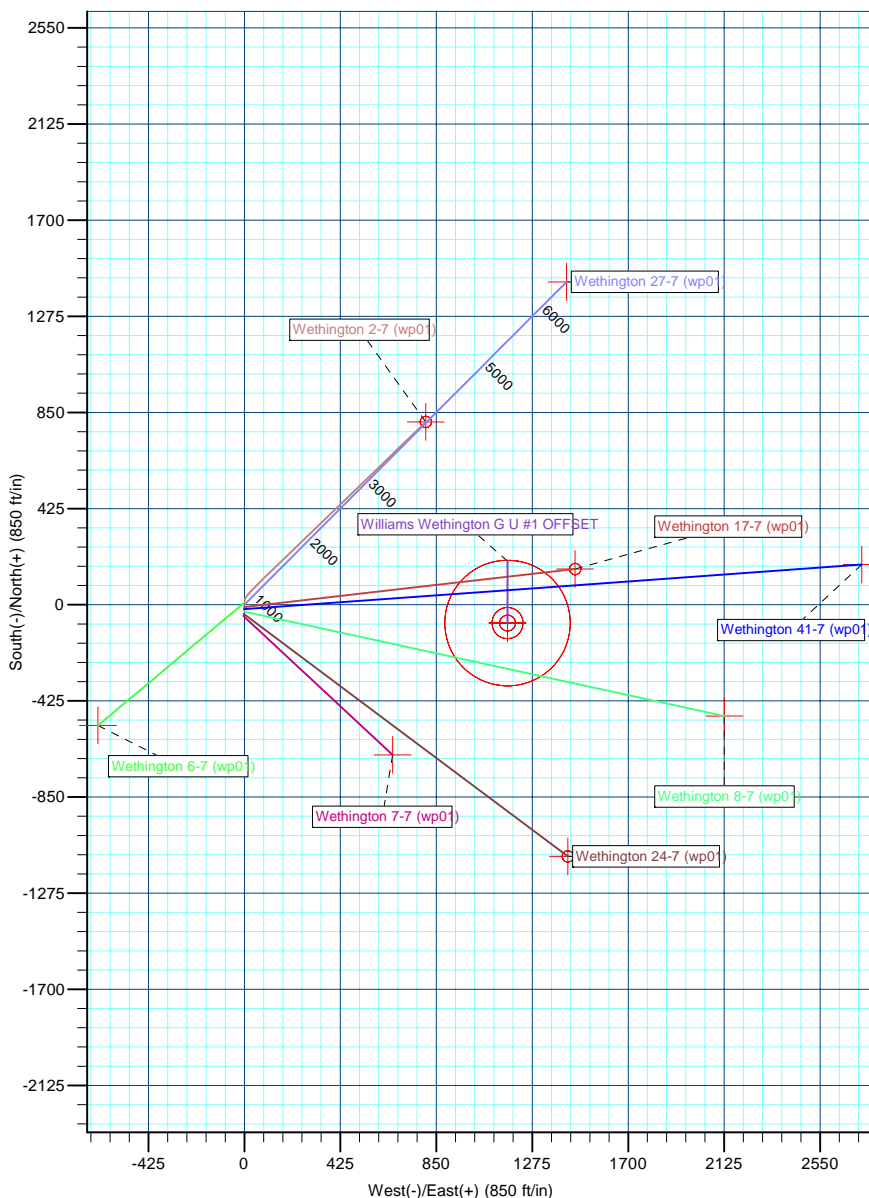
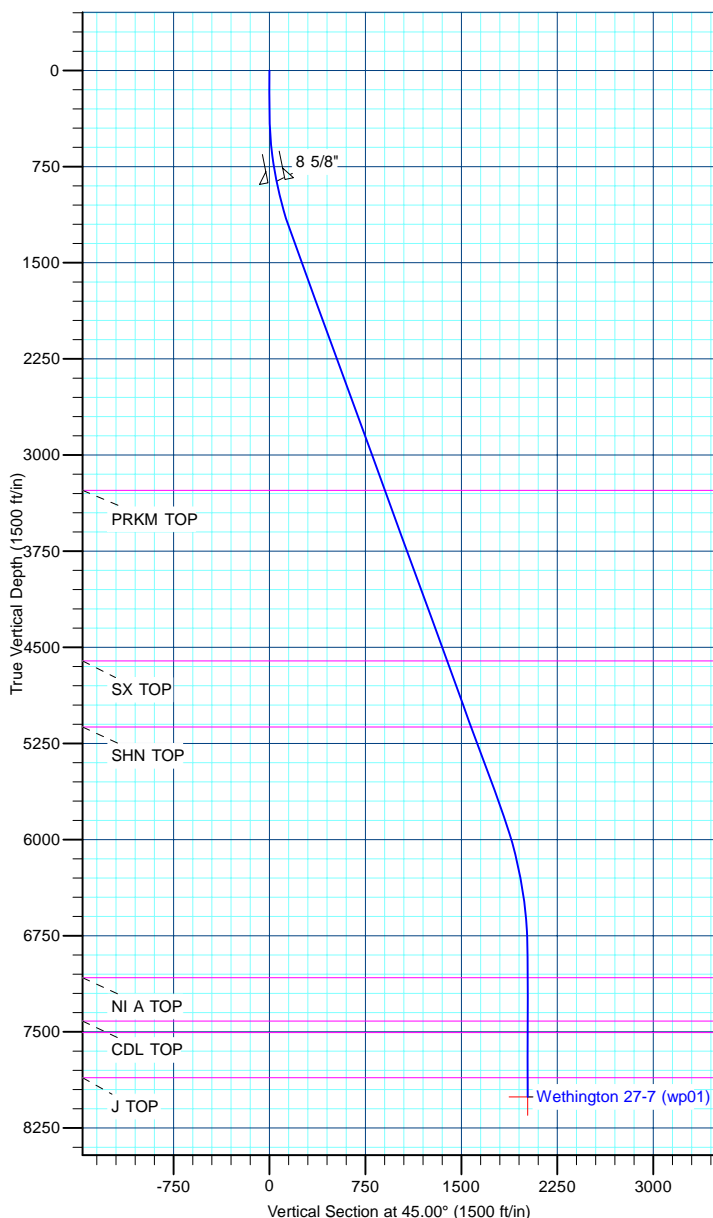
TVD	MD	Name	Size
865.00	868.73	8 5/8"	8-5/8

DESIGN TARGET DETAILS

Name	TVD	+N/-S	+E/-W	Northing	Easting	Latitude	Longitude	Shape Point
Wethington 27-7 BHL	8007.00	1427.29	1427.26	1270101.38	3191601.65	40.072788	-104.815346	

SECTION DETAILS

MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	Vsect
0.00	0.00	0.00	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
1304.32	20.09	45.00	1283.88	123.21	123.21	2.00	45.00	174.25
6094.37	20.09	45.00	5782.57	1286.48	1286.45	0.00	0.00	1819.33
7242.17	0.00	0.00	6907.00	1427.29	1427.26	1.75	180.00	2018.47
8342.17	0.00	0.00	8007.00	1427.29	1427.26	0.00	0.00	2018.47



Database:	edm5000p	Local Co-ordinate Reference:	Well Wethington 27-7
Company:	US ROCKIES REGION PLANNING	TVD Reference:	15' RKB + 4902' GL @ 4917.00ft
Project:	COLORADO NORTHERN ZONE - 83	MD Reference:	15' RKB + 4902' GL @ 4917.00ft
Site:	WELD_WETHINGTON PAD	North Reference:	True
Well:	Wethington 27-7	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wethington 27-7		
Design:	Wethington 27-7 (wp01)		

Project	COLORADO NORTHERN ZONE - 83		
Map System:	US State Plane 1983	System Datum:	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	Colorado Northern Zone		

Site		WELD_WETHINGTON PAD			
Site Position:		Northing:	1,268,683.25 ft	Latitude:	40.068925
From:	Lat/Long	Easting:	3,190,186.90 ft	Longitude:	-104.820440
Position Uncertainty:	0.00 ft	Slot Radius:	0 "	Grid Convergence:	0.44 °

Well	Wethington 27-7					
Well Position	+N-S	-20.05 ft	Northing:	1,268,663.18 ft	Latitude:	40.068870
	+E-W	-1.68 ft	Easting:	3,190,185.38 ft	Longitude:	-104.820446
Position Uncertainty		0.00 ft	Wellhead Elevation:		Ground Level:	4,902.00 ft

Wellbore	Wethington 27-7				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2010	5/3/2011	8.88	66.78	52,963

Design	Wethington 27-7 (wp01)			
Audit Notes:				
Version:	Phase:	PLAN	Tie On Depth:	0.00
Vertical Section:	Depth From (TVD) (ft)	+N/-S (ft)	+E/-W (ft)	Direction (°)
	0.00	0.00	0.00	45.00

Plan Sections										
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)	TFO (°)	Target
0.00	0.00	0.00	0.00	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	
1,304.32	20.09	45.00	1,283.88	123.21	123.21	2.00	2.00	0.00	45.00	
6,094.37	20.09	45.00	5,782.57	1,286.48	1,286.45	0.00	0.00	0.00	0.00	
7,242.17	0.00	0.00	6,907.00	1,427.29	1,427.26	1.75	-1.75	0.00	180.00	
8,342.17	0.00	0.00	8,007.00	1,427.29	1,427.26	0.00	0.00	0.00	0.00	Wethington 27-7 Bt

Database:	edm5000p	Local Co-ordinate Reference:	Well Wethington 27-7
Company:	US ROCKIES REGION PLANNING	TVD Reference:	15' RKB + 4902' GL @ 4917.00ft
Project:	COLORADO NORTHERN ZONE - 83	MD Reference:	15' RKB + 4902' GL @ 4917.00ft
Site:	WELD_WETHINGTON PAD	North Reference:	True
Well:	Wethington 27-7	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wethington 27-7		
Design:	Wethington 27-7 (wp01)		

Planned Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
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	2.00	45.00	399.98	1.23	1.23	1.75	2.00	2.00	0.00
500.00	4.00	45.00	499.84	4.93	4.93	6.98	2.00	2.00	0.00
600.00	6.00	45.00	599.45	11.10	11.10	15.69	2.00	2.00	0.00
700.00	8.00	45.00	698.70	19.71	19.71	27.88	2.00	2.00	0.00
800.00	10.00	45.00	797.47	30.78	30.77	43.52	2.00	2.00	0.00
868.73	11.37	45.00	865.00	39.79	39.79	56.27	2.00	2.00	0.00
8 5/8"									
900.00	12.00	45.00	895.62	44.27	44.27	62.60	2.00	2.00	0.00
1,000.00	14.00	45.00	993.06	60.17	60.17	85.10	2.00	2.00	0.00
1,100.00	16.00	45.00	1,089.64	78.47	78.47	110.98	2.00	2.00	0.00
1,200.00	18.00	45.00	1,185.27	99.15	99.14	140.21	2.00	2.00	0.00
1,300.00	20.00	45.00	1,279.82	122.17	122.16	172.77	2.00	2.00	0.00
1,304.32	20.09	45.00	1,283.88	123.21	123.21	174.25	2.00	2.00	0.00
1,400.00	20.09	45.00	1,373.73	146.45	146.45	207.11	0.00	0.00	0.00
1,500.00	20.09	45.00	1,467.65	170.73	170.73	241.45	0.00	0.00	0.00
1,600.00	20.09	45.00	1,561.57	195.02	195.01	275.80	0.00	0.00	0.00
1,700.00	20.09	45.00	1,655.49	219.30	219.30	310.14	0.00	0.00	0.00
1,800.00	20.09	45.00	1,749.40	243.59	243.58	344.48	0.00	0.00	0.00
1,900.00	20.09	45.00	1,843.32	267.87	267.87	378.83	0.00	0.00	0.00
2,000.00	20.09	45.00	1,937.24	292.16	292.15	413.17	0.00	0.00	0.00
2,100.00	20.09	45.00	2,031.16	316.44	316.44	447.51	0.00	0.00	0.00
2,200.00	20.09	45.00	2,125.07	340.73	340.72	481.86	0.00	0.00	0.00
2,300.00	20.09	45.00	2,218.99	365.01	365.01	516.20	0.00	0.00	0.00
2,400.00	20.09	45.00	2,312.91	389.30	389.29	550.55	0.00	0.00	0.00
2,500.00	20.09	45.00	2,406.83	413.58	413.57	584.89	0.00	0.00	0.00
2,600.00	20.09	45.00	2,500.74	437.87	437.86	619.23	0.00	0.00	0.00
2,700.00	20.09	45.00	2,594.66	462.15	462.14	653.58	0.00	0.00	0.00
2,800.00	20.09	45.00	2,688.58	486.44	486.43	687.92	0.00	0.00	0.00
2,900.00	20.09	45.00	2,782.50	510.72	510.71	722.26	0.00	0.00	0.00
3,000.00	20.09	45.00	2,876.42	535.01	535.00	756.61	0.00	0.00	0.00
3,100.00	20.09	45.00	2,970.33	559.29	559.28	790.95	0.00	0.00	0.00
3,200.00	20.09	45.00	3,064.25	583.58	583.57	825.30	0.00	0.00	0.00
3,300.00	20.09	45.00	3,158.17	607.86	607.85	859.64	0.00	0.00	0.00
3,400.00	20.09	45.00	3,252.09	632.15	632.13	893.98	0.00	0.00	0.00
3,426.53	20.09	45.00	3,277.00	638.59	638.58	903.09	0.00	0.00	0.00
PRKM TOP									
3,500.00	20.09	45.00	3,346.00	656.43	656.42	928.33	0.00	0.00	0.00
3,600.00	20.09	45.00	3,439.92	680.72	680.70	962.67	0.00	0.00	0.00
3,700.00	20.09	45.00	3,533.84	705.00	704.99	997.02	0.00	0.00	0.00
3,800.00	20.09	45.00	3,627.76	729.29	729.27	1,031.36	0.00	0.00	0.00
3,900.00	20.09	45.00	3,721.67	753.57	753.56	1,065.70	0.00	0.00	0.00
4,000.00	20.09	45.00	3,815.59	777.86	777.84	1,100.05	0.00	0.00	0.00
4,100.00	20.09	45.00	3,909.51	802.14	802.12	1,134.39	0.00	0.00	0.00
4,200.00	20.09	45.00	4,003.43	826.43	826.41	1,168.73	0.00	0.00	0.00
4,300.00	20.09	45.00	4,097.34	850.71	850.69	1,203.08	0.00	0.00	0.00
4,400.00	20.09	45.00	4,191.26	875.00	874.98	1,237.42	0.00	0.00	0.00
4,500.00	20.09	45.00	4,285.18	899.28	899.26	1,271.77	0.00	0.00	0.00
4,600.00	20.09	45.00	4,379.10	923.57	923.55	1,306.11	0.00	0.00	0.00
4,700.00	20.09	45.00	4,473.01	947.85	947.83	1,340.45	0.00	0.00	0.00
4,800.00	20.09	45.00	4,566.93	972.14	972.12	1,374.80	0.00	0.00	0.00

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Site:	WELD_WETHINGTON PAD	North Reference:	True
Well:	Wethington 27-7	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wethington 27-7		
Design:	Wethington 27-7 (wp01)		

Planned Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
4,842.66	20.09	45.00	4,607.00	982.50	982.48	1,389.45	0.00	0.00	0.00
SX TOP									
4,900.00	20.09	45.00	4,660.85	996.42	996.40	1,409.14	0.00	0.00	0.00
5,000.00	20.09	45.00	4,754.77	1,020.71	1,020.68	1,443.48	0.00	0.00	0.00
5,100.00	20.09	45.00	4,848.68	1,044.99	1,044.97	1,477.83	0.00	0.00	0.00
5,200.00	20.09	45.00	4,942.60	1,069.28	1,069.25	1,512.17	0.00	0.00	0.00
5,300.00	20.09	45.00	5,036.52	1,093.56	1,093.54	1,546.52	0.00	0.00	0.00
5,391.02	20.09	45.00	5,122.00	1,115.67	1,115.64	1,577.77	0.00	0.00	0.00
SHN TOP									
5,400.00	20.09	45.00	5,130.44	1,117.85	1,117.82	1,580.86	0.00	0.00	0.00
5,500.00	20.09	45.00	5,224.35	1,142.13	1,142.11	1,615.20	0.00	0.00	0.00
5,600.00	20.09	45.00	5,318.27	1,166.42	1,166.39	1,649.55	0.00	0.00	0.00
5,700.00	20.09	45.00	5,412.19	1,190.70	1,190.68	1,683.89	0.00	0.00	0.00
5,800.00	20.09	45.00	5,506.11	1,214.99	1,214.96	1,718.23	0.00	0.00	0.00
5,900.00	20.09	45.00	5,600.02	1,239.27	1,239.24	1,752.58	0.00	0.00	0.00
6,000.00	20.09	45.00	5,693.94	1,263.56	1,263.53	1,786.92	0.00	0.00	0.00
6,094.37	20.09	45.00	5,782.57	1,286.48	1,286.45	1,819.33	0.00	0.00	0.00
6,100.00	19.99	45.00	5,787.86	1,287.84	1,287.81	1,821.26	1.75	-1.75	0.00
6,200.00	18.24	45.00	5,882.34	1,310.99	1,310.96	1,854.00	1.75	-1.75	0.00
6,300.00	16.49	45.00	5,977.78	1,332.10	1,332.06	1,883.84	1.75	-1.75	0.00
6,400.00	14.74	45.00	6,074.09	1,351.13	1,351.09	1,910.76	1.75	-1.75	0.00
6,500.00	12.99	45.00	6,171.17	1,368.07	1,368.03	1,934.72	1.75	-1.75	0.00
6,600.00	11.24	45.00	6,268.94	1,382.90	1,382.87	1,955.70	1.75	-1.75	0.00
6,700.00	9.49	45.00	6,367.31	1,395.62	1,395.59	1,973.69	1.75	-1.75	0.00
6,800.00	7.74	45.00	6,466.18	1,406.21	1,406.18	1,988.66	1.75	-1.75	0.00
6,900.00	5.99	45.00	6,565.46	1,414.66	1,414.63	2,000.61	1.75	-1.75	0.00
7,000.00	4.24	45.00	6,665.06	1,420.96	1,420.93	2,009.52	1.75	-1.75	0.00
7,100.00	2.49	45.00	6,764.88	1,425.11	1,425.08	2,015.39	1.75	-1.75	0.00
7,200.00	0.74	45.00	6,864.84	1,427.10	1,427.07	2,018.20	1.75	-1.75	0.00
7,242.17	0.00	0.00	6,907.00	1,427.29	1,427.26	2,018.47	1.75	-1.75	0.00
7,300.00	0.00	0.00	6,964.83	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
7,400.00	0.00	0.00	7,064.83	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
7,412.17	0.00	0.00	7,077.00	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
NI A TOP									
7,500.00	0.00	0.00	7,164.83	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
7,600.00	0.00	0.00	7,264.83	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
7,700.00	0.00	0.00	7,364.83	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
7,752.17	0.00	0.00	7,417.00	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
CDL TOP									
7,800.00	0.00	0.00	7,464.83	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
7,842.17	0.00	0.00	7,507.00	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
GH TOP									
7,900.00	0.00	0.00	7,564.83	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
8,000.00	0.00	0.00	7,664.83	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
8,100.00	0.00	0.00	7,764.83	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
8,192.17	0.00	0.00	7,857.00	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
J TOP									
8,200.00	0.00	0.00	7,864.83	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
8,300.00	0.00	0.00	7,964.83	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
8,342.17	0.00	0.00	8,007.00	1,427.29	1,427.26	2,018.47	0.00	0.00	0.00
Wethington 27-7 BHL									

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Site:	WELD_WETHINGTON PAD	North Reference:	True
Well:	Wethington 27-7	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wethington 27-7		
Design:	Wethington 27-7 (wp01)		

Design Targets									
Target Name									
- hit/miss target	Dip Angle	Dip Dir.	TVD	+N/-S	+E/-W	Northing	Easting	Latitude	Longitude
- Shape	(°)	(°)	(ft)	(ft)	(ft)	(ft)	(ft)		
Wethington 27-7 BHL	0.00	0.00	8,007.00	1,427.29	1,427.26	1,270,101.37	3,191,601.65	40.072788	-104.815346
- plan hits target center									
- Point									

Casing Points					
Measured Depth	Vertical Depth			Casing Diameter	Hole Diameter
(ft)	(ft)			(")	(")
		Name			
868.73	865.00	8 5/8"		8-5/8	11

Formations						
Measured Depth	Vertical Depth				Dip	Dip Direction
(ft)	(ft)	Name		Lithology	(°)	(°)
3,426.53	3,277.00	PRKM TOP				
4,842.66	4,607.00	SX TOP				
5,391.02	5,122.00	SHN TOP				
7,412.17	7,077.00	NI A TOP				
7,752.17	7,417.00	CDL TOP				
7,842.17	7,507.00	GH TOP				
8,192.17	7,857.00	J TOP				

US ROCKIES REGION PLANNING

**COLORADO NORTHERN ZONE - 83
WELD_WETHINGTON PAD
Wethington 27-7**

**Wethington 27-7
Wethington 27-7 (wp01)**

Anticollision Summary Report

04 May, 2011



APC

Anticollision Summary Report



Company:	US ROCKIES REGION PLANNING	Local Co-ordinate Reference:	Well Wethington 27-7
Project:	COLORADO NORTHERN ZONE - 83	TVD Reference:	15' RKB + 4902' GL @ 4917.00ft
Reference Site:	WELD_WETHINGTON PAD	MD Reference:	15' RKB + 4902' GL @ 4917.00ft
Site Error:	0.00 ft	North Reference:	True
Reference Well:	Wethington 27-7	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 ft	Output errors are at	2.00 sigma
Reference Wellbore	Wethington 27-7	Database:	edm5000p
Reference Design:	Wethington 27-7 (wp01)	Offset TVD Reference:	Offset Datum

Reference	Wethington 27-7 (wp01)		
Filter type:	NO GLOBAL FILTER: Using user defined selection & filtering criteria		
Interpolation Method:	MD + Stations Interval 25.00ft	Error Model:	ISCWSA
Depth Range:	Unlimited	Scan Method:	Closest Approach 3D
Results Limited by:	Maximum center-center distance of 1,000.00 ft	Error Surface:	Elliptical Conic
Warning Levels Evaluated at:	2.00 Sigma		

Survey Tool Program	Date 5/4/2011			
From (ft)	To (ft)	Survey (Wellbore)	Tool Name	Description
0.00	8,342.17	Wethington 27-7 (wp01) (Wethington 27-7	MWD	MWD - Standard

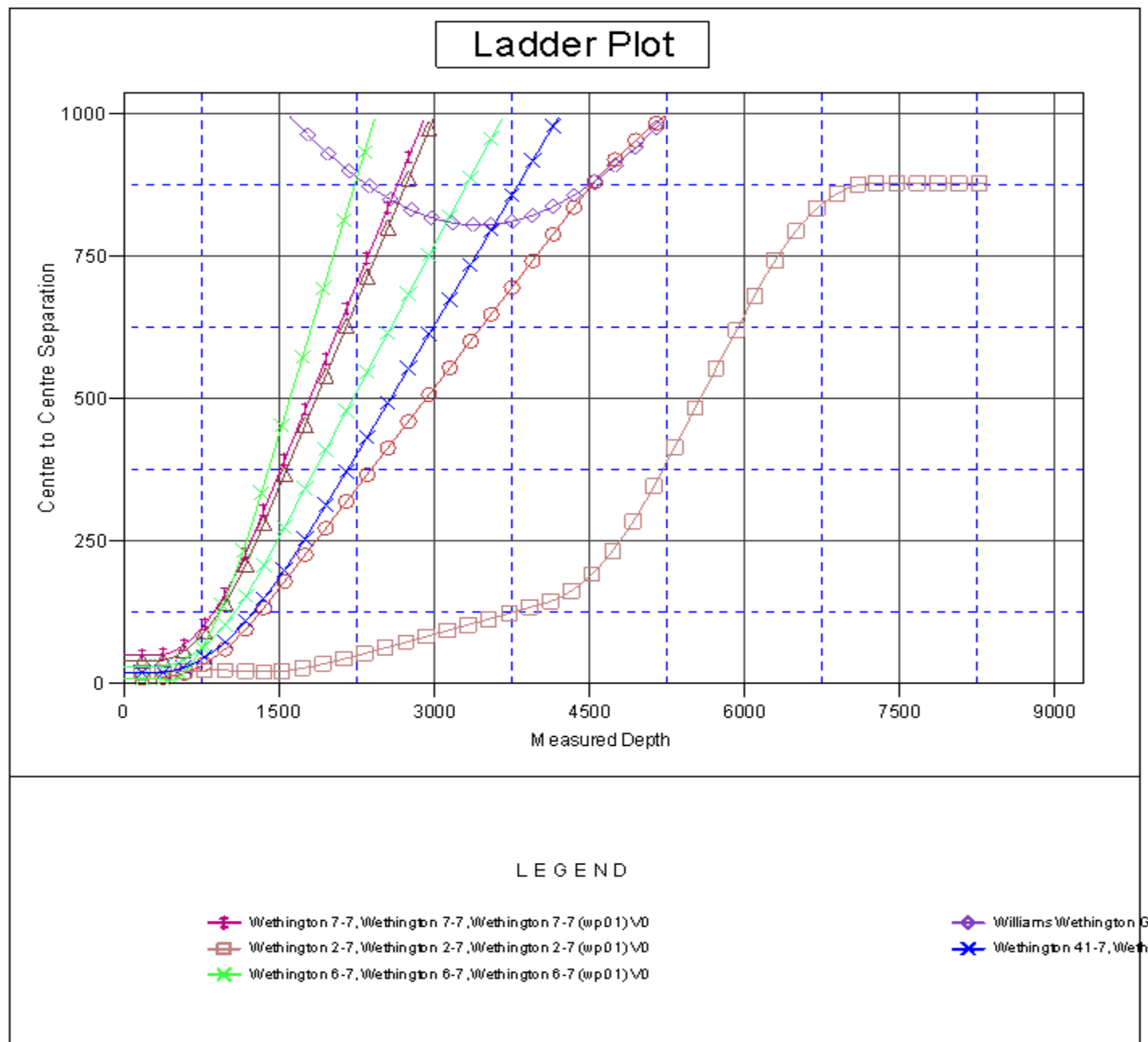
Summary						
Site Name	Reference Measured Depth (ft)	Offset Measured Depth (ft)	Distance Between Centres (ft)	Distance Between Ellipses (ft)	Separation Factor	Warning
WELD_WETHINGTON PAD						
Wethington 17-7 - Wethington 17-7 - Wethington 17-7 (w	300.00	300.00	10.23	9.14	9.388	CC
Wethington 17-7 - Wethington 17-7 - Wethington 17-7 (w	325.00	325.02	10.30	9.10	8.585	ES
Wethington 17-7 - Wethington 17-7 - Wethington 17-7 (w	450.00	450.06	12.53	10.78	7.167	SF
Wethington 24-7 - Wethington 24-7 - Wethington 24-7 (w	300.00	300.00	40.21	39.12	36.883	CC, ES
Wethington 24-7 - Wethington 24-7 - Wethington 24-7 (w	550.00	547.36	54.28	52.11	25.025	SF
Wethington 2-7 - Wethington 2-7 - Wethington 2-7 (wp01	300.00	300.00	20.11	19.02	18.451	CC
Wethington 2-7 - Wethington 2-7 - Wethington 2-7 (wp01	1,450.00	1,446.66	21.15	11.27	2.141	ES
Wethington 2-7 - Wethington 2-7 - Wethington 2-7 (wp01	1,500.00	1,496.59	21.73	11.50	2.123	SF
Wethington 41-7 - Wethington 41-7 - Wethington 41-7 (w	300.00	300.00	20.11	19.02	18.443	CC
Wethington 41-7 - Wethington 41-7 - Wethington 41-7 (w	325.00	325.03	20.17	18.97	16.821	ES
Wethington 41-7 - Wethington 41-7 - Wethington 41-7 (w	550.00	550.04	27.00	24.79	12.224	SF
Wethington 6-7 - Wethington 6-7 - Wethington 6-7 (wp01	444.36	444.34	6.69	4.98	3.919	CC, ES
Wethington 6-7 - Wethington 6-7 - Wethington 6-7 (wp01	450.00	449.95	6.71	4.98	3.879	SF
Wethington 7-7 - Wethington 7-7 - Wethington 7-7 (wp01	300.00	300.00	50.08	48.99	45.942	CC, ES
Wethington 7-7 - Wethington 7-7 - Wethington 7-7 (wp01	575.00	570.88	68.19	65.92	29.981	SF
Wethington 8-7 - Wethington 8-7 - Wethington 8-7 (wp01	300.00	300.00	29.97	28.88	27.495	CC
Wethington 8-7 - Wethington 8-7 - Wethington 8-7 (wp01	325.00	324.97	30.07	28.87	25.096	ES
Wethington 8-7 - Wethington 8-7 - Wethington 8-7 (wp01	575.00	574.05	41.99	39.68	18.155	SF
Williams Wethington G U #1 - Williams Wethington G U #	3,428.03	3,286.60	805.42	785.76	40.952	CC
Williams Wethington G U #1 - Williams Wethington G U #	3,475.00	3,331.08	805.57	785.58	40.315	ES
Williams Wethington G U #1 - Williams Wethington G U #	4,550.00	4,349.19	882.28	856.59	34.343	SF

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

Company:	US ROCKIES REGION PLANNING	Local Co-ordinate Reference:	Well Wethington 27-7
Project:	COLORADO NORTHERN ZONE - 83	TVD Reference:	15' RKB + 4902' GL @ 4917.00ft
Reference Site:	WELD_WETHINGTON PAD	MD Reference:	15' RKB + 4902' GL @ 4917.00ft
Site Error:	0.00 ft	North Reference:	True
Reference Well:	Wethington 27-7	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 ft	Output errors are at	2.00 sigma
Reference Wellbore	Wethington 27-7	Database:	edm5000p
Reference Design:	Wethington 27-7 (wp01)	Offset TVD Reference:	Offset Datum

Reference Depths are relative to 15' RKB + 4902' GL @ 4917.00ft
Offset Depths are relative to Offset Datum
Central Meridian is -105.500000

Coordinates are relative to: Wethington 27-7
Coordinate System is US State Plane 1983, Colorado Northern Zone
Grid Convergence at Surface is: 0.44°



Company:	US ROCKIES REGION PLANNING	Local Co-ordinate Reference:	Well Wethington 27-7
Project:	COLORADO NORTHERN ZONE - 83	TVD Reference:	15' RKB + 4902' GL @ 4917.00ft
Reference Site:	WELD_WETHINGTON PAD	MD Reference:	15' RKB + 4902' GL @ 4917.00ft
Site Error:	0.00 ft	North Reference:	True
Reference Well:	Wethington 27-7	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 ft	Output errors are at	2.00 sigma
Reference Wellbore	Wethington 27-7	Database:	edm5000p
Reference Design:	Wethington 27-7 (wp01)	Offset TVD Reference:	Offset Datum

Reference Depths are relative to 15' RKB + 4902' GL @ 4917.00ft
Offset Depths are relative to Offset Datum
Central Meridian is -105.500000

Coordinates are relative to: Wethington 27-7
Coordinate System is US State Plane 1983, Colorado Northern Zone
Grid Convergence at Surface is: 0.44°

