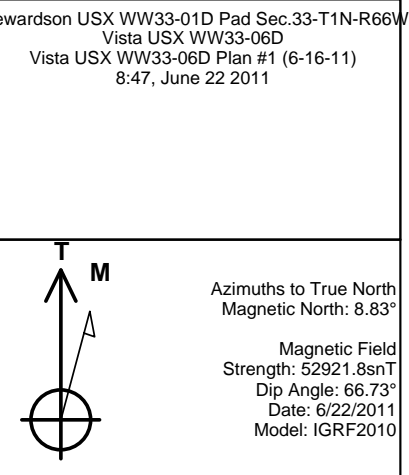
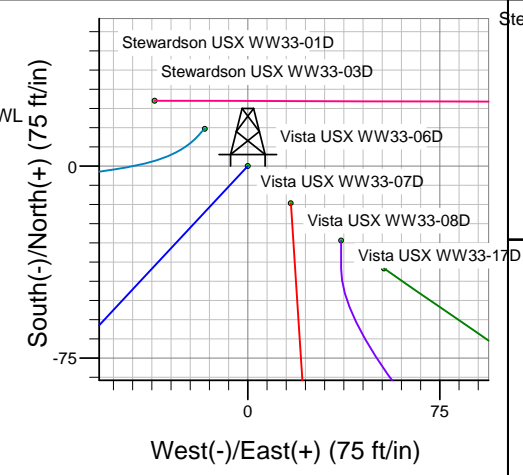
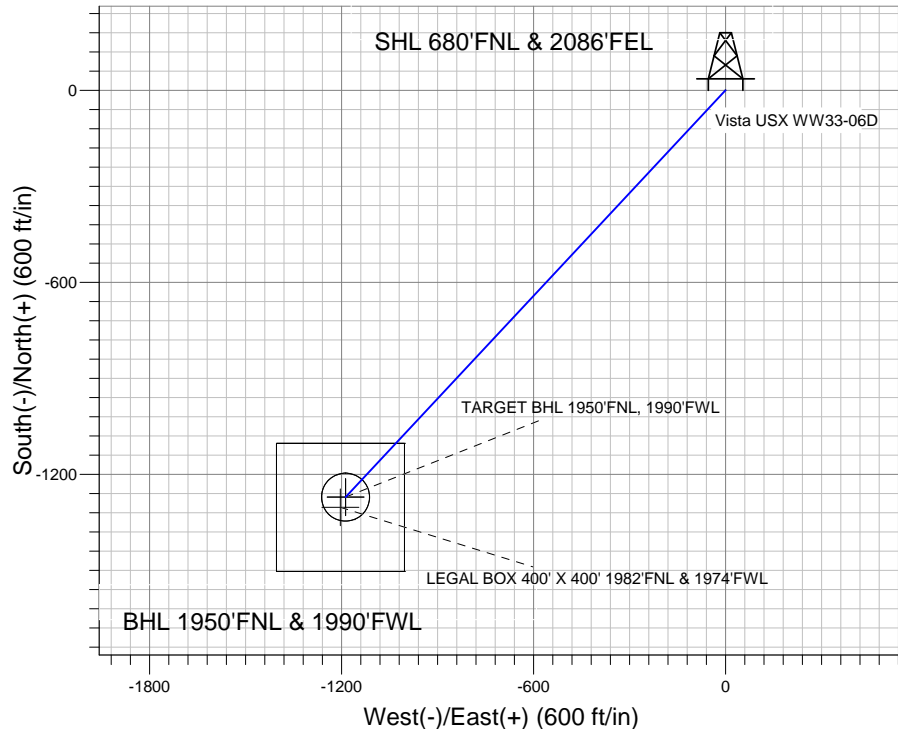
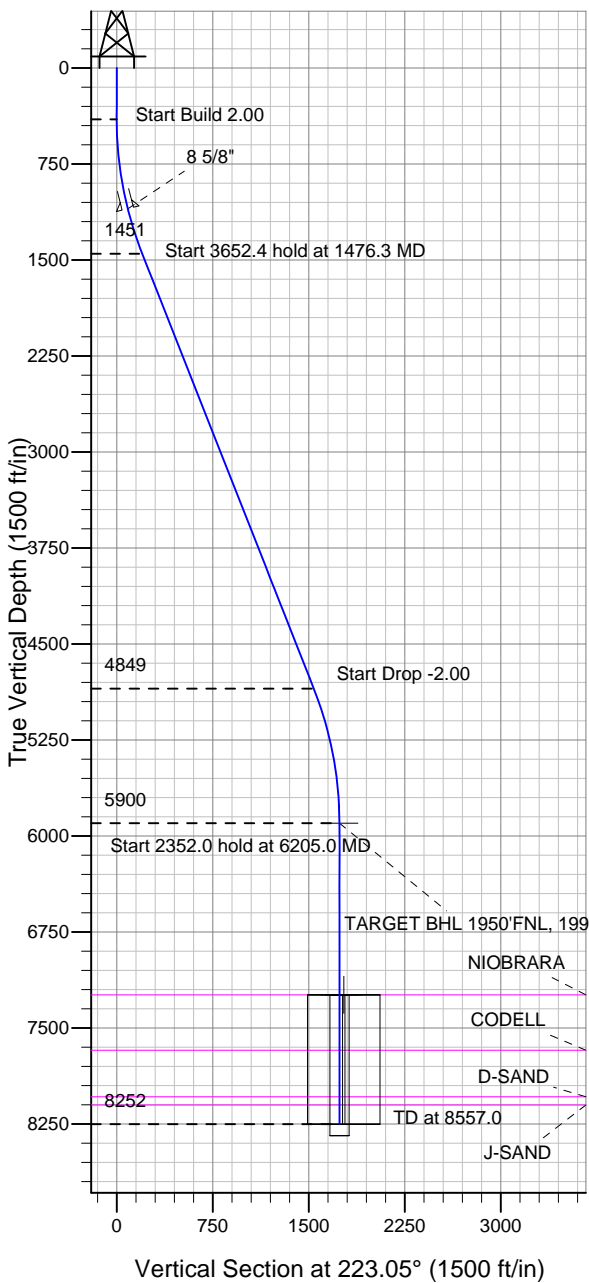


Well Name: Vista USX WW33-06D

Surface Location: Stewardson USX WW33-01D Pad Sec.33-T1N-R66W
 North American Datum 1983 US State Plane 1983 Colorado Northern Zone
 Ground Elevation: 5072.0
 +N/-S +E/-W Northing Easting Latitude Longitude Slot
 0.0 0.0 1248433.59 3201630.44 40.013090 -104.780140
 Original Well Elev WELL @ 5085.0ft (Original Well Elev)

NOBLE ENERGY INC WELD COUNTY CO



WELLBORE TARGET DETAILS (LAT/LONG)

Name	TVD	+N/-S	+E/-W	Latitude	Longitude	Shape
TARGET BHL 1950'FNL, 1990'FWL	5900.0	-1271.3	-1187.7	40.009600	-104.784380	Point
LEGAL BOX 400' X 400' 1982'FNL & 1974'FWL	7241.0	-1303.3	-1203.7	40.009512	-104.784437	Rectangle (Sides: L400.0 W400.0)
TARGET CIRCLE 1950'FNL, 1990'FWL	7241.0	-1271.3	-1187.7	40.009600	-104.784380	Circle (Radius: 75.0)

SECTION DETAILS

Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	DLeg	TFace	VSec	Target
1	0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.0	
2	400.0	0.00	0.00	400.0	0.0	0.0	0.00	0.00	0.0	
3	1476.3	21.53	223.05	1451.2	-146.0	-136.4	2.00	223.05	199.8	
4	5128.7	21.53	223.05	4848.8	-1125.3	-1051.3	0.00	0.00	1540.0	
5	6205.0	0.00	0.00	5900.0	-1271.3	-1187.7	2.00	180.00	1739.8	TARGET BHL 1950'FNL, 1990'FWL
6	8557.0	0.00	0.00	8252.0	-1271.3	-1187.7	0.00	0.00	1739.8	



Directional

NOBLE ENERGY INC WELD COUNTY CO

SEC.33-T1N-R66W

Stewardson USX WW33-01D Pad Sec.33-T1N-R66W

Vista USX WW33-06D

Wellbore #1

Plan: Vista USX WW33-06D Plan #1 (6-16-11)

Standard Planning Report

22 June, 2011



Database:	Landmark	Local Co-ordinate Reference:	Well Vista USX WW33-06D
Company:	NOBLE ENERGY INC WELD COUNTY CO	TVD Reference:	WELL @ 5085.0ft (Original Well Elev)
Project:	SEC.33-T1N-R66W	MD Reference:	WELL @ 5085.0ft (Original Well Elev)
Site:	Stewardson USX WW33-01D Pad Sec.33-T1N-R66W	North Reference:	True
Well:	Vista USX WW33-06D	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Vista USX WW33-06D Plan #1 (6-16-11)		

Project	SEC.33-T1N-R66W, Weld County, Colorado		
Map System:	US State Plane 1983	System Datum:	Mean Sea Level
Geo Datum:	North American Datum 1983		Using Well Reference Point
Map Zone:	Colorado Northern Zone		Using geodetic scale factor

Site						Stewardson USX WW33-01D Pad Sec.33-T1N-R66W											
Site Position:						Northing:			1,248,458.80ft			Latitude:			40.013160		
From:			Lat/Long			Easting:			3,201,593.82ft			Longitude:			-104.780270		
Position Uncertainty:			0.0 ft			Slot Radius:			"			Grid Convergence:			0.47 °		

Well	Vista USX WW33-06D					
Well Position	+N-S	-25.5 ft	Northing:	1,248,433.59 ft	Latitude:	40.013090
	+E-W	36.4 ft	Easting:	3,201,630.44 ft	Longitude:	-104.780140
Position Uncertainty		0.0 ft	Wellhead Elevation:	ft	Ground Level:	5,072.0 ft

Wellbore	Wellbore #1				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2010	6/22/2011	8.84	66.73	52,922

Design	Vista USX WW33-06D Plan #1 (6-16-11)			
Audit Notes:				
Version:	Phase:	PROTOTYPE	Tie On Depth:	0.0
Vertical Section:	Depth From (TVD) (ft)	+N/-S (ft)	+E/-W (ft)	Direction (°)
	0.0	0.0	0.0	223.05

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
0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.00	0.00	
400.0	0.00	0.00	400.0	0.0	0.0	0.00	0.00	0.00	0.00	
1,476.3	21.53	223.05	1,451.2	-146.0	-136.4	2.00	2.00	0.00	223.05	
5,128.7	21.53	223.05	4,848.8	-1,125.3	-1,051.3	0.00	0.00	0.00	0.00	
6,205.0	0.00	0.00	5,900.0	-1,271.3	-1,187.7	2.00	-2.00	0.00	180.00	TARGET BHL 195C
8,557.0	0.00	0.00	8,252.0	-1,271.3	-1,187.7	0.00	0.00	0.00	0.00	

Database:	Landmark	Local Co-ordinate Reference:	Well Vista USX WW33-06D
Company:	NOBLE ENERGY INC WELD COUNTY CO	TVD Reference:	WELL @ 5085.0ft (Original Well Elev)
Project:	SEC.33-T1N-R66W	MD Reference:	WELL @ 5085.0ft (Original Well Elev)
Site:	Stewardson USX WW33-01D Pad Sec.33-T1N-R66W	North Reference:	True
Well:	Vista USX WW33-06D	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Vista USX WW33-06D Plan #1 (6-16-11)		

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)
0.0	0.00	0.00	0.0	0.0	0.0	0.0	0.00	0.00	0.00
40.0	0.00	0.00	40.0	0.0	0.0	0.0	0.00	0.00	0.00
80.0	0.00	0.00	80.0	0.0	0.0	0.0	0.00	0.00	0.00
120.0	0.00	0.00	120.0	0.0	0.0	0.0	0.00	0.00	0.00
160.0	0.00	0.00	160.0	0.0	0.0	0.0	0.00	0.00	0.00
200.0	0.00	0.00	200.0	0.0	0.0	0.0	0.00	0.00	0.00
240.0	0.00	0.00	240.0	0.0	0.0	0.0	0.00	0.00	0.00
280.0	0.00	0.00	280.0	0.0	0.0	0.0	0.00	0.00	0.00
320.0	0.00	0.00	320.0	0.0	0.0	0.0	0.00	0.00	0.00
360.0	0.00	0.00	360.0	0.0	0.0	0.0	0.00	0.00	0.00
400.0	0.00	0.00	400.0	0.0	0.0	0.0	0.00	0.00	0.00
440.0	0.80	223.05	440.0	-0.2	-0.2	0.3	2.00	2.00	0.00
480.0	1.60	223.05	480.0	-0.8	-0.8	1.1	2.00	2.00	0.00
520.0	2.40	223.05	520.0	-1.8	-1.7	2.5	2.00	2.00	0.00
560.0	3.20	223.05	559.9	-3.3	-3.0	4.5	2.00	2.00	0.00
600.0	4.00	223.05	599.8	-5.1	-4.8	7.0	2.00	2.00	0.00
640.0	4.80	223.05	639.7	-7.3	-6.9	10.0	2.00	2.00	0.00
680.0	5.60	223.05	679.6	-10.0	-9.3	13.7	2.00	2.00	0.00
720.0	6.40	223.05	719.3	-13.0	-12.2	17.9	2.00	2.00	0.00
760.0	7.20	223.05	759.1	-16.5	-15.4	22.6	2.00	2.00	0.00
800.0	8.00	223.05	798.7	-20.4	-19.0	27.9	2.00	2.00	0.00
840.0	8.80	223.05	838.3	-24.6	-23.0	33.7	2.00	2.00	0.00
880.0	9.60	223.05	877.8	-29.3	-27.4	40.1	2.00	2.00	0.00
920.0	10.40	223.05	917.1	-34.4	-32.1	47.1	2.00	2.00	0.00
960.0	11.20	223.05	956.4	-39.9	-37.2	54.6	2.00	2.00	0.00
1,000.0	12.00	223.05	995.6	-45.7	-42.7	62.6	2.00	2.00	0.00
1,040.0	12.80	223.05	1,034.7	-52.0	-48.6	71.2	2.00	2.00	0.00
1,080.0	13.60	223.05	1,073.6	-58.7	-54.8	80.3	2.00	2.00	0.00
1,107.2	14.14	223.05	1,100.0	-63.5	-59.3	86.8	2.00	2.00	0.00
8 5/8"									
1,120.0	14.40	223.05	1,112.4	-65.8	-61.4	90.0	2.00	2.00	0.00
1,160.0	15.20	223.05	1,151.1	-73.2	-68.4	100.2	2.00	2.00	0.00
1,200.0	16.00	223.05	1,189.6	-81.1	-75.8	111.0	2.00	2.00	0.00
1,240.0	16.80	223.05	1,228.0	-89.3	-83.5	122.3	2.00	2.00	0.00
1,280.0	17.60	223.05	1,266.2	-98.0	-91.5	134.1	2.00	2.00	0.00
1,320.0	18.40	223.05	1,304.3	-107.0	-100.0	146.5	2.00	2.00	0.00
1,360.0	19.20	223.05	1,342.1	-116.4	-108.8	159.3	2.00	2.00	0.00
1,400.0	20.00	223.05	1,379.8	-126.2	-117.9	172.8	2.00	2.00	0.00
1,440.0	20.80	223.05	1,417.3	-136.4	-127.5	186.7	2.00	2.00	0.00
1,476.3	21.53	223.05	1,451.2	-146.0	-136.4	199.8	2.00	2.00	0.00
1,480.0	21.53	223.05	1,454.6	-147.0	-137.3	201.2	0.00	0.00	0.00
1,520.0	21.53	223.05	1,491.8	-157.7	-147.4	215.9	0.00	0.00	0.00
1,560.0	21.53	223.05	1,529.0	-168.5	-157.4	230.5	0.00	0.00	0.00
1,600.0	21.53	223.05	1,566.2	-179.2	-167.4	245.2	0.00	0.00	0.00
1,640.0	21.53	223.05	1,603.4	-189.9	-177.4	259.9	0.00	0.00	0.00
1,680.0	21.53	223.05	1,640.6	-200.6	-187.4	274.6	0.00	0.00	0.00
1,720.0	21.53	223.05	1,677.9	-211.4	-197.5	289.2	0.00	0.00	0.00
1,760.0	21.53	223.05	1,715.1	-222.1	-207.5	303.9	0.00	0.00	0.00
1,800.0	21.53	223.05	1,752.3	-232.8	-217.5	318.6	0.00	0.00	0.00
1,840.0	21.53	223.05	1,789.5	-243.5	-227.5	333.3	0.00	0.00	0.00
1,880.0	21.53	223.05	1,826.7	-254.3	-237.5	347.9	0.00	0.00	0.00
1,920.0	21.53	223.05	1,863.9	-265.0	-247.6	362.6	0.00	0.00	0.00
1,960.0	21.53	223.05	1,901.1	-275.7	-257.6	377.3	0.00	0.00	0.00

Database:	Landmark	Local Co-ordinate Reference:	Well Vista USX WW33-06D
Company:	NOBLE ENERGY INC WELD COUNTY CO	TVD Reference:	WELL @ 5085.0ft (Original Well Elev)
Project:	SEC.33-T1N-R66W	MD Reference:	WELL @ 5085.0ft (Original Well Elev)
Site:	Stewardson USX WW33-01D Pad Sec.33-T1N-R66W	North Reference:	True
Well:	Vista USX WW33-06D	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Vista USX WW33-06D Plan #1 (6-16-11)		

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)	
2,000.0	21.53	223.05	1,938.3	-286.4	-267.6	392.0	0.00	0.00	0.00	
2,040.0	21.53	223.05	1,975.5	-297.2	-277.6	406.7	0.00	0.00	0.00	
2,080.0	21.53	223.05	2,012.7	-307.9	-287.6	421.3	0.00	0.00	0.00	
2,120.0	21.53	223.05	2,050.0	-318.6	-297.7	436.0	0.00	0.00	0.00	
2,160.0	21.53	223.05	2,087.2	-329.3	-307.7	450.7	0.00	0.00	0.00	
2,200.0	21.53	223.05	2,124.4	-340.1	-317.7	465.4	0.00	0.00	0.00	
2,240.0	21.53	223.05	2,161.6	-350.8	-327.7	480.0	0.00	0.00	0.00	
2,280.0	21.53	223.05	2,198.8	-361.5	-337.7	494.7	0.00	0.00	0.00	
2,320.0	21.53	223.05	2,236.0	-372.2	-347.7	509.4	0.00	0.00	0.00	
2,360.0	21.53	223.05	2,273.2	-382.9	-357.8	524.1	0.00	0.00	0.00	
2,400.0	21.53	223.05	2,310.4	-393.7	-367.8	538.7	0.00	0.00	0.00	
2,440.0	21.53	223.05	2,347.6	-404.4	-377.8	553.4	0.00	0.00	0.00	
2,480.0	21.53	223.05	2,384.8	-415.1	-387.8	568.1	0.00	0.00	0.00	
2,520.0	21.53	223.05	2,422.1	-425.8	-397.8	582.8	0.00	0.00	0.00	
2,560.0	21.53	223.05	2,459.3	-436.6	-407.9	597.5	0.00	0.00	0.00	
2,600.0	21.53	223.05	2,496.5	-447.3	-417.9	612.1	0.00	0.00	0.00	
2,640.0	21.53	223.05	2,533.7	-458.0	-427.9	626.8	0.00	0.00	0.00	
2,680.0	21.53	223.05	2,570.9	-468.7	-437.9	641.5	0.00	0.00	0.00	
2,720.0	21.53	223.05	2,608.1	-479.5	-447.9	656.2	0.00	0.00	0.00	
2,760.0	21.53	223.05	2,645.3	-490.2	-458.0	670.8	0.00	0.00	0.00	
2,800.0	21.53	223.05	2,682.5	-500.9	-468.0	685.5	0.00	0.00	0.00	
2,840.0	21.53	223.05	2,719.7	-511.6	-478.0	700.2	0.00	0.00	0.00	
2,880.0	21.53	223.05	2,756.9	-522.4	-488.0	714.9	0.00	0.00	0.00	
2,920.0	21.53	223.05	2,794.2	-533.1	-498.0	729.5	0.00	0.00	0.00	
2,960.0	21.53	223.05	2,831.4	-543.8	-508.1	744.2	0.00	0.00	0.00	
3,000.0	21.53	223.05	2,868.6	-554.5	-518.1	758.9	0.00	0.00	0.00	
3,040.0	21.53	223.05	2,905.8	-565.3	-528.1	773.6	0.00	0.00	0.00	
3,080.0	21.53	223.05	2,943.0	-576.0	-538.1	788.3	0.00	0.00	0.00	
3,120.0	21.53	223.05	2,980.2	-586.7	-548.1	802.9	0.00	0.00	0.00	
3,160.0	21.53	223.05	3,017.4	-597.4	-558.2	817.6	0.00	0.00	0.00	
3,200.0	21.53	223.05	3,054.6	-608.2	-568.2	832.3	0.00	0.00	0.00	
3,240.0	21.53	223.05	3,091.8	-618.9	-578.2	847.0	0.00	0.00	0.00	
3,280.0	21.53	223.05	3,129.0	-629.6	-588.2	861.6	0.00	0.00	0.00	
3,320.0	21.53	223.05	3,166.3	-640.3	-598.2	876.3	0.00	0.00	0.00	
3,360.0	21.53	223.05	3,203.5	-651.1	-608.3	891.0	0.00	0.00	0.00	
3,400.0	21.53	223.05	3,240.7	-661.8	-618.3	905.7	0.00	0.00	0.00	
3,440.0	21.53	223.05	3,277.9	-672.5	-628.3	920.4	0.00	0.00	0.00	
3,480.0	21.53	223.05	3,315.1	-683.2	-638.3	935.0	0.00	0.00	0.00	
3,520.0	21.53	223.05	3,352.3	-694.0	-648.3	949.7	0.00	0.00	0.00	
3,560.0	21.53	223.05	3,389.5	-704.7	-658.4	964.4	0.00	0.00	0.00	
3,600.0	21.53	223.05	3,426.7	-715.4	-668.4	979.1	0.00	0.00	0.00	
3,640.0	21.53	223.05	3,463.9	-726.1	-678.4	993.7	0.00	0.00	0.00	
3,680.0	21.53	223.05	3,501.1	-736.9	-688.4	1,008.4	0.00	0.00	0.00	
3,720.0	21.53	223.05	3,538.4	-747.6	-698.4	1,023.1	0.00	0.00	0.00	
3,760.0	21.53	223.05	3,575.6	-758.3	-708.5	1,037.8	0.00	0.00	0.00	
3,800.0	21.53	223.05	3,612.8	-769.0	-718.5	1,052.4	0.00	0.00	0.00	
3,840.0	21.53	223.05	3,650.0	-779.8	-728.5	1,067.1	0.00	0.00	0.00	
3,880.0	21.53	223.05	3,687.2	-790.5	-738.5	1,081.8	0.00	0.00	0.00	
3,920.0	21.53	223.05	3,724.4	-801.2	-748.5	1,096.5	0.00	0.00	0.00	
3,960.0	21.53	223.05	3,761.6	-811.9	-758.6	1,111.2	0.00	0.00	0.00	
4,000.0	21.53	223.05	3,798.8	-822.7	-768.6	1,125.8	0.00	0.00	0.00	
4,040.0	21.53	223.05	3,836.0	-833.4	-778.6	1,140.5	0.00	0.00	0.00	
4,080.0	21.53	223.05	3,873.2	-844.1	-788.6	1,155.2	0.00	0.00	0.00	

Database:	Landmark	Local Co-ordinate Reference:	Well Vista USX WW33-06D
Company:	NOBLE ENERGY INC WELD COUNTY CO	TVD Reference:	WELL @ 5085.0ft (Original Well Elev)
Project:	SEC.33-T1N-R66W	MD Reference:	WELL @ 5085.0ft (Original Well Elev)
Site:	Stewardson USX WW33-01D Pad	North Reference:	True
Well:	Vista USX WW33-06D	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Vista USX WW33-06D Plan #1 (6-16-11)		

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)
4,120.0	21.53	223.05	3,910.5	-854.8	-798.6	1,169.9	0.00	0.00	0.00
4,160.0	21.53	223.05	3,947.7	-865.6	-808.7	1,184.5	0.00	0.00	0.00
4,200.0	21.53	223.05	3,984.9	-876.3	-818.7	1,199.2	0.00	0.00	0.00
4,240.0	21.53	223.05	4,022.1	-887.0	-828.7	1,213.9	0.00	0.00	0.00
4,280.0	21.53	223.05	4,059.3	-897.7	-838.7	1,228.6	0.00	0.00	0.00
4,320.0	21.53	223.05	4,096.5	-908.5	-848.7	1,243.2	0.00	0.00	0.00
4,360.0	21.53	223.05	4,133.7	-919.2	-858.8	1,257.9	0.00	0.00	0.00
4,400.0	21.53	223.05	4,170.9	-929.9	-868.8	1,272.6	0.00	0.00	0.00
4,440.0	21.53	223.05	4,208.1	-940.6	-878.8	1,287.3	0.00	0.00	0.00
4,480.0	21.53	223.05	4,245.3	-951.4	-888.8	1,302.0	0.00	0.00	0.00
4,520.0	21.53	223.05	4,282.6	-962.1	-898.8	1,316.6	0.00	0.00	0.00
4,560.0	21.53	223.05	4,319.8	-972.8	-908.9	1,331.3	0.00	0.00	0.00
4,600.0	21.53	223.05	4,357.0	-983.5	-918.9	1,346.0	0.00	0.00	0.00
4,640.0	21.53	223.05	4,394.2	-994.3	-928.9	1,360.7	0.00	0.00	0.00
4,680.0	21.53	223.05	4,431.4	-1,005.0	-938.9	1,375.3	0.00	0.00	0.00
4,720.0	21.53	223.05	4,468.6	-1,015.7	-948.9	1,390.0	0.00	0.00	0.00
4,760.0	21.53	223.05	4,505.8	-1,026.4	-959.0	1,404.7	0.00	0.00	0.00
4,800.0	21.53	223.05	4,543.0	-1,037.2	-969.0	1,419.4	0.00	0.00	0.00
4,840.0	21.53	223.05	4,580.2	-1,047.9	-979.0	1,434.1	0.00	0.00	0.00
4,880.0	21.53	223.05	4,617.4	-1,058.6	-989.0	1,448.7	0.00	0.00	0.00
4,920.0	21.53	223.05	4,654.7	-1,069.3	-999.0	1,463.4	0.00	0.00	0.00
4,960.0	21.53	223.05	4,691.9	-1,080.1	-1,009.0	1,478.1	0.00	0.00	0.00
5,000.0	21.53	223.05	4,729.1	-1,090.8	-1,019.1	1,492.8	0.00	0.00	0.00
5,040.0	21.53	223.05	4,766.3	-1,101.5	-1,029.1	1,507.4	0.00	0.00	0.00
5,080.0	21.53	223.05	4,803.5	-1,112.2	-1,039.1	1,522.1	0.00	0.00	0.00
5,120.0	21.53	223.05	4,840.7	-1,123.0	-1,049.1	1,536.8	0.00	0.00	0.00
5,128.7	21.53	223.05	4,848.8	-1,125.3	-1,051.3	1,540.0	0.00	0.00	0.00
5,160.0	20.90	223.05	4,878.0	-1,133.6	-1,059.0	1,551.3	2.00	-2.00	0.00
5,200.0	20.10	223.05	4,915.4	-1,143.8	-1,068.6	1,565.3	2.00	-2.00	0.00
5,240.0	19.30	223.05	4,953.1	-1,153.7	-1,077.8	1,578.8	2.00	-2.00	0.00
5,280.0	18.50	223.05	4,990.9	-1,163.1	-1,086.7	1,591.8	2.00	-2.00	0.00
5,320.0	17.70	223.05	5,029.0	-1,172.2	-1,095.1	1,604.2	2.00	-2.00	0.00
5,360.0	16.90	223.05	5,067.2	-1,180.9	-1,103.3	1,616.1	2.00	-2.00	0.00
5,400.0	16.10	223.05	5,105.5	-1,189.2	-1,111.0	1,627.4	2.00	-2.00	0.00
5,440.0	15.30	223.05	5,144.0	-1,197.1	-1,118.4	1,638.3	2.00	-2.00	0.00
5,480.0	14.50	223.05	5,182.7	-1,204.6	-1,125.4	1,648.6	2.00	-2.00	0.00
5,520.0	13.70	223.05	5,221.5	-1,211.8	-1,132.1	1,658.3	2.00	-2.00	0.00
5,560.0	12.90	223.05	5,260.4	-1,218.5	-1,138.4	1,667.5	2.00	-2.00	0.00
5,600.0	12.10	223.05	5,299.4	-1,224.8	-1,144.3	1,676.2	2.00	-2.00	0.00
5,640.0	11.30	223.05	5,338.6	-1,230.7	-1,149.8	1,684.3	2.00	-2.00	0.00
5,680.0	10.50	223.05	5,377.9	-1,236.3	-1,155.0	1,691.8	2.00	-2.00	0.00
5,720.0	9.70	223.05	5,417.3	-1,241.4	-1,159.8	1,698.9	2.00	-2.00	0.00
5,760.0	8.90	223.05	5,456.7	-1,246.1	-1,164.2	1,705.3	2.00	-2.00	0.00
5,800.0	8.10	223.05	5,496.3	-1,250.4	-1,168.2	1,711.2	2.00	-2.00	0.00
5,840.0	7.30	223.05	5,535.9	-1,254.4	-1,171.9	1,716.6	2.00	-2.00	0.00
5,880.0	6.50	223.05	5,575.7	-1,257.9	-1,175.2	1,721.4	2.00	-2.00	0.00
5,920.0	5.70	223.05	5,615.4	-1,261.0	-1,178.1	1,725.6	2.00	-2.00	0.00
5,960.0	4.90	223.05	5,655.3	-1,263.7	-1,180.6	1,729.3	2.00	-2.00	0.00
6,000.0	4.10	223.05	5,695.1	-1,266.0	-1,182.7	1,732.5	2.00	-2.00	0.00
6,040.0	3.30	223.05	5,735.0	-1,267.8	-1,184.5	1,735.1	2.00	-2.00	0.00
6,080.0	2.50	223.05	5,775.0	-1,269.3	-1,185.9	1,737.1	2.00	-2.00	0.00
6,120.0	1.70	223.05	5,815.0	-1,270.4	-1,186.9	1,738.6	2.00	-2.00	0.00
6,160.0	0.90	223.05	5,855.0	-1,271.1	-1,187.5	1,739.5	2.00	-2.00	0.00

Database:	Landmark	Local Co-ordinate Reference:	Well Vista USX WW33-06D
Company:	NOBLE ENERGY INC WELD COUNTY CO	TVD Reference:	WELL @ 5085.0ft (Original Well Elev)
Project:	SEC.33-T1N-R66W	MD Reference:	WELL @ 5085.0ft (Original Well Elev)
Site:	Stewardson USX WW33-01D Pad Sec.33-T1N-R66W	North Reference:	True
Well:	Vista USX WW33-06D	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Vista USX WW33-06D Plan #1 (6-16-11)		

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)
6,200.0	0.10	223.05	5,895.0	-1,271.3	-1,187.7	1,739.8	2.00	-2.00	0.00
6,205.0	0.00	0.00	5,900.0	-1,271.3	-1,187.7	1,739.8	2.00	-2.00	0.00
TARGET BHL 1950'FNL, 1990'FWL									
6,240.0	0.00	0.00	5,935.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,280.0	0.00	0.00	5,975.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,320.0	0.00	0.00	6,015.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,360.0	0.00	0.00	6,055.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,400.0	0.00	0.00	6,095.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,440.0	0.00	0.00	6,135.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,480.0	0.00	0.00	6,175.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,520.0	0.00	0.00	6,215.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,560.0	0.00	0.00	6,255.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,600.0	0.00	0.00	6,295.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,640.0	0.00	0.00	6,335.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,680.0	0.00	0.00	6,375.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,720.0	0.00	0.00	6,415.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,760.0	0.00	0.00	6,455.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,800.0	0.00	0.00	6,495.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,840.0	0.00	0.00	6,535.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,880.0	0.00	0.00	6,575.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,920.0	0.00	0.00	6,615.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
6,960.0	0.00	0.00	6,655.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,000.0	0.00	0.00	6,695.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,040.0	0.00	0.00	6,735.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,080.0	0.00	0.00	6,775.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,120.0	0.00	0.00	6,815.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,160.0	0.00	0.00	6,855.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,200.0	0.00	0.00	6,895.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,240.0	0.00	0.00	6,935.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,280.0	0.00	0.00	6,975.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,320.0	0.00	0.00	7,015.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,360.0	0.00	0.00	7,055.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,400.0	0.00	0.00	7,095.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,440.0	0.00	0.00	7,135.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,480.0	0.00	0.00	7,175.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,520.0	0.00	0.00	7,215.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,546.0	0.00	0.00	7,241.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
NIOBRARA - LEGAL BOX 400' X 400' 1982'FNL & 1974'FWL - TARGET CIRCLE 1950'FNL, 1990'FWL									
7,560.0	0.00	0.00	7,255.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,600.0	0.00	0.00	7,295.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,640.0	0.00	0.00	7,335.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,680.0	0.00	0.00	7,375.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,720.0	0.00	0.00	7,415.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,760.0	0.00	0.00	7,455.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,800.0	0.00	0.00	7,495.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,840.0	0.00	0.00	7,535.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,880.0	0.00	0.00	7,575.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,920.0	0.00	0.00	7,615.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,960.0	0.00	0.00	7,655.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
7,979.0	0.00	0.00	7,674.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
CODELL									
8,000.0	0.00	0.00	7,695.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00
8,040.0	0.00	0.00	7,735.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00

Database:	Landmark	Local Co-ordinate Reference:	Well Vista USX WW33-06D
Company:	NOBLE ENERGY INC WELD COUNTY CO	TVD Reference:	WELL @ 5085.0ft (Original Well Elev)
Project:	SEC.33-T1N-R66W	MD Reference:	WELL @ 5085.0ft (Original Well Elev)
Site:	Stewardson USX WW33-01D Pad Sec.33-T1N-R66W	North Reference:	True
Well:	Vista USX WW33-06D	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Vista USX WW33-06D Plan #1 (6-16-11)		

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)	
8,080.0	0.00	0.00	7,775.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
8,120.0	0.00	0.00	7,815.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
8,160.0	0.00	0.00	7,855.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
8,200.0	0.00	0.00	7,895.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
8,240.0	0.00	0.00	7,935.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
8,280.0	0.00	0.00	7,975.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
8,320.0	0.00	0.00	8,015.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
8,342.0	0.00	0.00	8,037.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
D-SAND										
8,360.0	0.00	0.00	8,055.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
8,400.0	0.00	0.00	8,095.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
8,407.0	0.00	0.00	8,102.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
J-SAND										
8,440.0	0.00	0.00	8,135.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
8,480.0	0.00	0.00	8,175.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
8,520.0	0.00	0.00	8,215.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	
8,557.0	0.00	0.00	8,252.0	-1,271.3	-1,187.7	1,739.8	0.00	0.00	0.00	

Targets										
Target Name	- hit/miss target	Dip Angle (°)	Dip Dir. (°)	TVD (ft)	+N/-S (ft)	+E/-W (ft)	Northing (ft)	Easting (ft)	Latitude	Longitude
LEGAL BOX 400' X 400'	- plan misses target center by 35.7ft at 7546.0ft MD (7241.0 TVD, -1271.3 N, -1187.7 E)	0.00	0.00	7,241.0	-1,303.3	-1,203.7	1,247,120.61	3,200,437.40	40.009512	-104.784437
	- Rectangle (sides W400.0 H400.0 D1,011.0)									
TARGET CIRCLE 19'	- plan hits target center	0.00	0.00	7,241.0	-1,271.3	-1,187.7	1,247,152.71	3,200,453.12	40.009600	-104.784380
	- Circle (radius 75.0)									
TARGET BHL 1950'F	- plan hits target center	0.00	0.00	5,900.0	-1,271.3	-1,187.7	1,247,152.71	3,200,453.12	40.009600	-104.784380
	- Point									

Casing Points					
Measured Depth (ft)	Vertical Depth (ft)	Name	Casing Diameter (")	Hole Diameter (")	
1,107.2	1,100.0	8 5/8"	8-5/8	12-1/4	

Formations						
Measured Depth (ft)	Vertical Depth (ft)	Name	Lithology	Dip (°)	Dip Direction (°)	
7,546.0	7,241.0	NIOBRARA		0.00		
7,979.0	7,674.0	CODELL		0.00		
8,342.0	8,037.0	D-SAND		0.00		
8,407.0	8,102.0	J-SAND		0.00		

Database:	Landmark	Local Co-ordinate Reference:	Well Vista USX WW33-06D
Company:	NOBLE ENERGY INC WELD COUNTY CO	TVD Reference:	WELL @ 5085.0ft (Original Well Elev)
Project:	SEC.33-T1N-R66W	MD Reference:	WELL @ 5085.0ft (Original Well Elev)
Site:	Stewardson USX WW33-01D Pad Sec.33-T1N-R66W	North Reference:	True
Well:	Vista USX WW33-06D	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Vista USX WW33-06D Plan #1 (6-16-11)		