

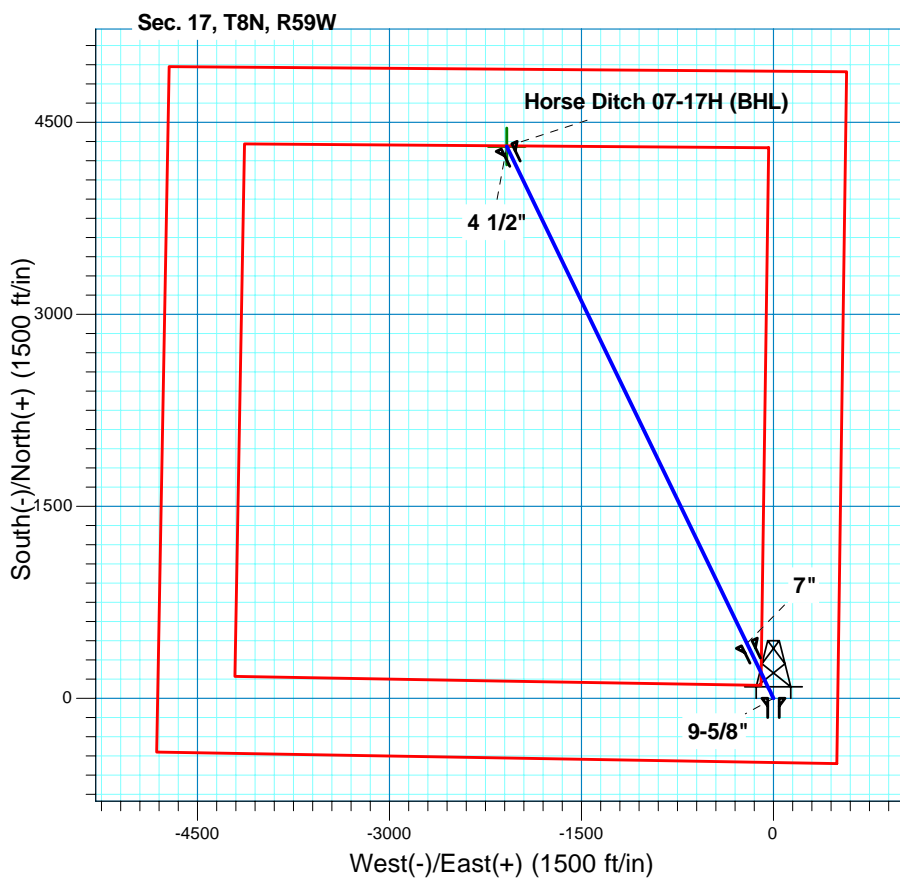
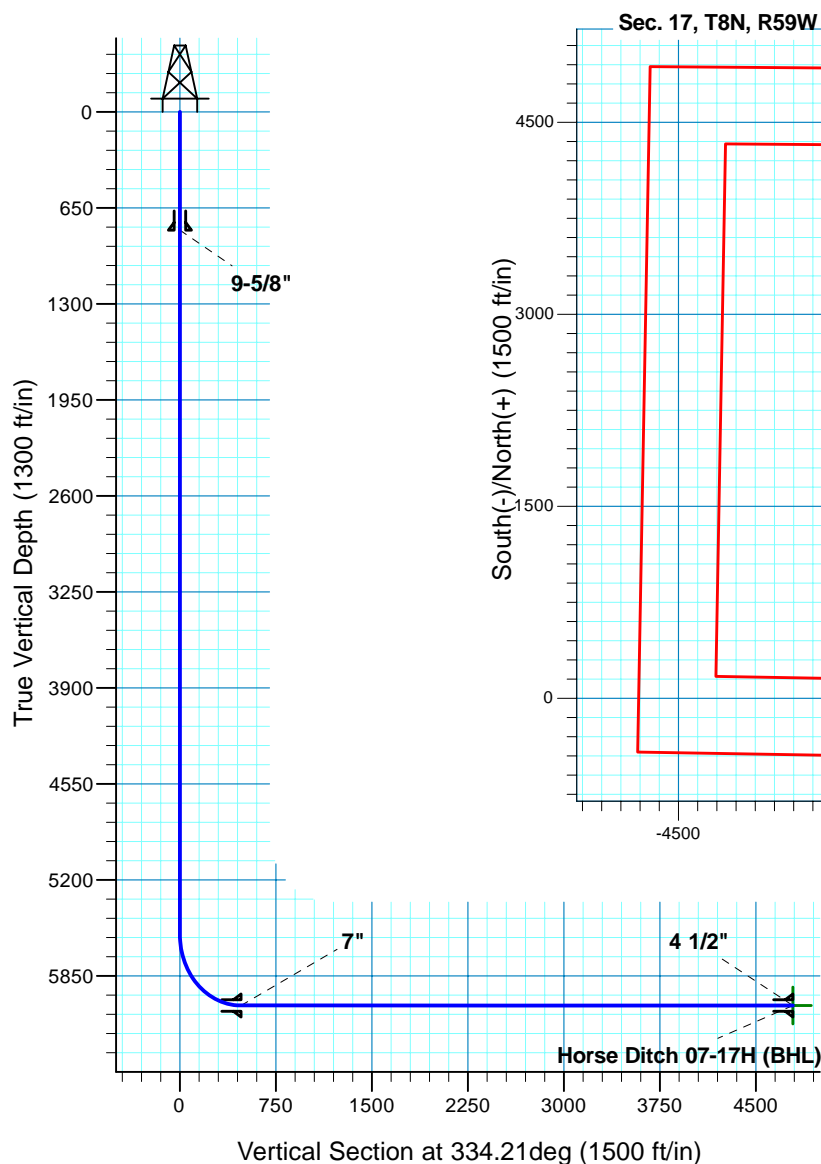
Horse Ditch 07-17H

Section 17 T8N R59W

Weld County, CO

Surface Location

NAD 1927 (NADCON CONUS) Colorado North 501
 Ground Elevation: 4834.00 RIG @ 4856.00ft (TBD)
 Northing Easting Latitude Longitude
 485464.12 2418259.11 40° 39' 22.529 N 103° 59' 32.989 W



T M
 Azimuths to True North
 Magnetic North: 8.39°
 Magnetic Field
 Strength: 53347.7nT
 Dip Angle: 67.39°
 Date: 8/16/2011
 Model: IGRF200510

Project: DJ - Hereford Ranch
 Site: Horse Ditch 07-17H
 Well: Horse Ditch 07-17H
 Plan: APD Directional Plan

SECTION DETAILS

Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	DLeg	TFace	VSec	Target
1	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
2	5572.53	0.00	0.00	5572.53	0.00	0.00	0.00	0.00	0.00	
3	6322.54	90.00	334.21	6050.00	429.89	-207.76	12.00	334.21	477.47	
4	10633.59	90.00	334.21	6050.00	4311.41	-2083.68	0.00	0.00	4788.52	Horse Ditch 07-17H (BHL)

TARGET DETAILS

Name	TVD	+N/-S	+E/-W	Northing	Easting	Latitude	Longitude	Shape Point
Horse Ditch 07-17H (BHL)	6050.00	4311.41	-2083.68	489739.47	2416102.45	40° 40' 5.131 N	104° 0' 0.029 W	

Denver Division- Colorado

DJ - Hereford Ranch

Horse Ditch 07-17H

Horse Ditch 07-17H

Original Wellbore

Plan: APD Directional Plan

Standard Planning Report

16 August, 2011

EOG Resources Inc

Planning Report

Database:	EDM	Local Co-ordinate Reference:	Site Horse Ditch 07-17H
Company:	Denver Division- Colorado	TVD Reference:	RIG @ 4856.00ft (TBD)
Project:	DJ - Hereford Ranch	MD Reference:	RIG @ 4856.00ft (TBD)
Site:	Horse Ditch 07-17H	North Reference:	True
Well:	Horse Ditch 07-17H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Original Wellbore		
Design:	APD Directional Plan		

Project	DJ - Hereford Ranch, Weld County		
Map System:	US State Plane 1927 (Exact solution)	System Datum:	Mean Sea Level
Geo Datum:	NAD 1927 (NADCON CONUS)		
Map Zone:	Colorado North 501		

Site	Horse Ditch 07-17H				
Site Position:		Northing:	485,464.12 ft	Latitude:	40° 39' 22.529 N
From:	Lat/Long	Easting:	2,418,259.11 ft	Longitude:	103° 59' 32.989 W
Position Uncertainty:	0.00 ft	Slot Radius:	"	Grid Convergence:	0.97 deg

Well	Horse Ditch 07-17H					
Well Position	+N-S	0.00 ft	Northing:	485,464.12 ft	Latitude:	40° 39' 22.529 N
	+E-W	0.00 ft	Easting:	2,418,259.11 ft	Longitude:	103° 59' 32.989 W
Position Uncertainty		0.00 ft	Wellhead Elevation:	ft	Ground Level:	4,834.00 ft

Wellbore	Original Wellbore				
Magnetics	Model Name	Sample Date	Declination (deg)	Dip Angle (deg)	Field Strength (nT)
	IGRF200510	8/16/2011	8.39	67.39	53,348

Design	APD Directional Plan			
Audit Notes:				
Version:	Phase:	PROTOTYPE	Tie On Depth:	0.00
Vertical Section:	Depth From (TVD) (ft)	+N/-S (ft)	+E/-W (ft)	Direction (deg)
	0.00	0.00	0.00	334.21

Plan Sections										
Measured Depth (ft)	Inclination (deg)	Azimuth (deg)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Dogleg Rate (?/100ft)	Build Rate (?/100ft)	Turn Rate (?/100ft)	TFO (deg)	Target
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
5,572.53	0.00	0.00	5,572.53	0.00	0.00	0.00	0.00	0.00	0.00	
6,322.54	90.00	334.21	6,050.00	429.89	-207.76	12.00	12.00	0.00	334.21	
10,633.59	90.00	334.21	6,050.00	4,311.41	-2,083.68	0.00	0.00	0.00	0.00	Horse Ditch 07-17H

EOG Resources Inc

Planning Report

Database:	EDM	Local Co-ordinate Reference:	Site Horse Ditch 07-17H
Company:	Denver Division- Colorado	TVD Reference:	RIG @ 4856.00ft (TBD)
Project:	DJ - Hereford Ranch	MD Reference:	RIG @ 4856.00ft (TBD)
Site:	Horse Ditch 07-17H	North Reference:	True
Well:	Horse Ditch 07-17H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Original Wellbore		
Design:	APD Directional Plan		

Planned Survey									
Measured Depth (ft)	Inclination (deg)	Azimuth (deg)	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	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
9-5/8"									
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
4,900.00	0.00	0.00	4,900.00	0.00	0.00	0.00	0.00	0.00	0.00
5,000.00	0.00	0.00	5,000.00	0.00	0.00	0.00	0.00	0.00	0.00
5,100.00	0.00	0.00	5,100.00	0.00	0.00	0.00	0.00	0.00	0.00
5,200.00	0.00	0.00	5,200.00	0.00	0.00	0.00	0.00	0.00	0.00

EOG Resources Inc

Planning Report

Database:	EDM	Local Co-ordinate Reference:	Site Horse Ditch 07-17H
Company:	Denver Division- Colorado	TVD Reference:	RIG @ 4856.00ft (TBD)
Project:	DJ - Hereford Ranch	MD Reference:	RIG @ 4856.00ft (TBD)
Site:	Horse Ditch 07-17H	North Reference:	True
Well:	Horse Ditch 07-17H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Original Wellbore		
Design:	APD Directional Plan		

Planned Survey									
Measured Depth (ft)	Inclination (deg)	Azimuth (deg)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (?/100ft)	Build Rate (?/100ft)	Turn Rate (?/100ft)
5,300.00	0.00	0.00	5,300.00	0.00	0.00	0.00	0.00	0.00	0.00
5,400.00	0.00	0.00	5,400.00	0.00	0.00	0.00	0.00	0.00	0.00
5,500.00	0.00	0.00	5,500.00	0.00	0.00	0.00	0.00	0.00	0.00
5,572.53	0.00	0.00	5,572.53	0.00	0.00	0.00	0.00	0.00	0.00
5,600.00	3.30	334.21	5,599.98	0.71	-0.34	0.79	12.00	12.00	0.00
5,700.00	15.30	334.21	5,698.49	15.23	-7.36	16.91	12.00	12.00	0.00
5,800.00	27.30	334.21	5,791.49	47.87	-23.13	53.17	12.00	12.00	0.00
5,900.00	39.30	334.21	5,874.92	97.20	-46.98	107.96	12.00	12.00	0.00
6,000.00	51.30	334.21	5,945.14	161.08	-77.85	178.91	12.00	12.00	0.00
6,100.00	63.30	334.21	5,999.07	236.71	-114.40	262.90	12.00	12.00	0.00
6,200.00	75.30	334.21	6,034.36	320.77	-155.03	356.27	12.00	12.00	0.00
6,300.00	87.30	334.21	6,049.47	409.61	-197.96	454.94	12.00	12.00	0.00
6,322.54	90.00	334.21	6,050.00	429.90	-207.77	477.47	12.00	12.00	0.00
7"									
6,400.00	90.00	334.21	6,050.00	499.64	-241.47	554.93	0.00	0.00	0.00
6,500.00	90.00	334.21	6,050.00	589.67	-284.99	654.93	0.00	0.00	0.00
6,600.00	90.00	334.21	6,050.00	679.71	-328.50	754.93	0.00	0.00	0.00
6,700.00	90.00	334.21	6,050.00	769.75	-372.01	854.93	0.00	0.00	0.00
6,800.00	90.00	334.21	6,050.00	859.78	-415.53	954.93	0.00	0.00	0.00
6,900.00	90.00	334.21	6,050.00	949.82	-459.04	1,054.93	0.00	0.00	0.00
7,000.00	90.00	334.21	6,050.00	1,039.86	-502.56	1,154.93	0.00	0.00	0.00
7,100.00	90.00	334.21	6,050.00	1,129.89	-546.07	1,254.93	0.00	0.00	0.00
7,200.00	90.00	334.21	6,050.00	1,219.93	-589.58	1,354.93	0.00	0.00	0.00
7,300.00	90.00	334.21	6,050.00	1,309.96	-633.10	1,454.93	0.00	0.00	0.00
7,400.00	90.00	334.21	6,050.00	1,400.00	-676.61	1,554.93	0.00	0.00	0.00
7,500.00	90.00	334.21	6,050.00	1,490.04	-720.13	1,654.93	0.00	0.00	0.00
7,600.00	90.00	334.21	6,050.00	1,580.07	-763.64	1,754.93	0.00	0.00	0.00
7,700.00	90.00	334.21	6,050.00	1,670.11	-807.15	1,854.93	0.00	0.00	0.00
7,800.00	90.00	334.21	6,050.00	1,760.15	-850.67	1,954.93	0.00	0.00	0.00
7,900.00	90.00	334.21	6,050.00	1,850.18	-894.18	2,054.93	0.00	0.00	0.00
8,000.00	90.00	334.21	6,050.00	1,940.22	-937.70	2,154.93	0.00	0.00	0.00
8,100.00	90.00	334.21	6,050.00	2,030.26	-981.21	2,254.93	0.00	0.00	0.00
8,200.00	90.00	334.21	6,050.00	2,120.29	-1,024.72	2,354.93	0.00	0.00	0.00
8,300.00	90.00	334.21	6,050.00	2,210.33	-1,068.24	2,454.93	0.00	0.00	0.00
8,400.00	90.00	334.21	6,050.00	2,300.36	-1,111.75	2,554.93	0.00	0.00	0.00
8,500.00	90.00	334.21	6,050.00	2,390.40	-1,155.27	2,654.93	0.00	0.00	0.00
8,600.00	90.00	334.21	6,050.00	2,480.44	-1,198.78	2,754.93	0.00	0.00	0.00
8,700.00	90.00	334.21	6,050.00	2,570.47	-1,242.29	2,854.93	0.00	0.00	0.00
8,800.00	90.00	334.21	6,050.00	2,660.51	-1,285.81	2,954.93	0.00	0.00	0.00
8,900.00	90.00	334.21	6,050.00	2,750.55	-1,329.32	3,054.93	0.00	0.00	0.00
9,000.00	90.00	334.21	6,050.00	2,840.58	-1,372.84	3,154.93	0.00	0.00	0.00
9,100.00	90.00	334.21	6,050.00	2,930.62	-1,416.35	3,254.93	0.00	0.00	0.00
9,200.00	90.00	334.21	6,050.00	3,020.65	-1,459.86	3,354.93	0.00	0.00	0.00
9,300.00	90.00	334.21	6,050.00	3,110.69	-1,503.38	3,454.93	0.00	0.00	0.00
9,400.00	90.00	334.21	6,050.00	3,200.73	-1,546.89	3,554.93	0.00	0.00	0.00
9,500.00	90.00	334.21	6,050.00	3,290.76	-1,590.41	3,654.93	0.00	0.00	0.00
9,600.00	90.00	334.21	6,050.00	3,380.80	-1,633.92	3,754.93	0.00	0.00	0.00
9,700.00	90.00	334.21	6,050.00	3,470.84	-1,677.43	3,854.93	0.00	0.00	0.00
9,800.00	90.00	334.21	6,050.00	3,560.87	-1,720.95	3,954.93	0.00	0.00	0.00
9,900.00	90.00	334.21	6,050.00	3,650.91	-1,764.46	4,054.93	0.00	0.00	0.00
10,000.00	90.00	334.21	6,050.00	3,740.94	-1,807.98	4,154.93	0.00	0.00	0.00
10,100.00	90.00	334.21	6,050.00	3,830.98	-1,851.49	4,254.93	0.00	0.00	0.00
10,200.00	90.00	334.21	6,050.00	3,921.02	-1,895.00	4,354.93	0.00	0.00	0.00

EOG Resources Inc

Planning Report

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Company:	Denver Division- Colorado	TVD Reference:	RIG @ 4856.00ft (TBD)
Project:	DJ - Hereford Ranch	MD Reference:	RIG @ 4856.00ft (TBD)
Site:	Horse Ditch 07-17H	North Reference:	True
Well:	Horse Ditch 07-17H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Original Wellbore		
Design:	APD Directional Plan		

Planned Survey									
Measured Depth (ft)	Inclination (deg)	Azimuth (deg)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (?/100ft)	Build Rate (?/100ft)	Turn Rate (?/100ft)
10,300.00	90.00	334.21	6,050.00	4,011.05	-1,938.52	4,454.93	0.00	0.00	0.00
10,400.00	90.00	334.21	6,050.00	4,101.09	-1,982.03	4,554.93	0.00	0.00	0.00
10,500.00	90.00	334.21	6,050.00	4,191.13	-2,025.55	4,654.93	0.00	0.00	0.00
10,600.00	90.00	334.21	6,050.00	4,281.16	-2,069.06	4,754.93	0.00	0.00	0.00
10,633.59	90.00	334.21	6,050.00	4,311.41	-2,083.68	4,788.52	0.00	0.00	0.00
4 1/2" - Horse Ditch 07-17H (BHL)									

Design Targets									
Target Name	Dip Angle (deg)	Dip Dir. (deg)	TVD (ft)	+N/-S (ft)	+E/-W (ft)	Northing (ft)	Easting (ft)	Latitude	Longitude
- hit/miss target									
- Shape									
Horse Ditch 07-17H (E	0.00	0.00	6,050.00	4,311.41	-2,083.68	489,739.47	2,416,102.45	40° 40' 5.131 N	104° 0' 0.029 W
- plan hits target center									
- Point									

Casing Points					
Measured Depth (ft)	Vertical Depth (ft)	Name	Casing Diameter (")	Hole Diameter (")	
800.00	800.00	9-5/8"	9-5/8	13-1/2	
6,322.54	6,050.00	7"	7	8-3/4	
10,633.59	6,050.00	4 1/2"	4-1/2	6	