

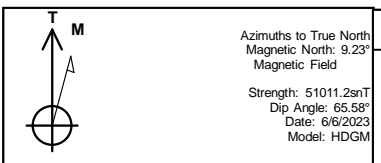


REFERENCE INFORMATION

Co-ordinate (N/E) Reference: Well TR 333-28-597 - Slot TR 333-28-597, True North  
 Vertical (TVD) Reference: RKB @ 30' @ 8513.0ft  
 Section (VS) Reference: Slot - TR 333-28-597(0.0N, 0.0E)  
 Measured Depth Reference: RKB @ 30' @ 8513.0ft  
 Calculation Method: Minimum Curvature



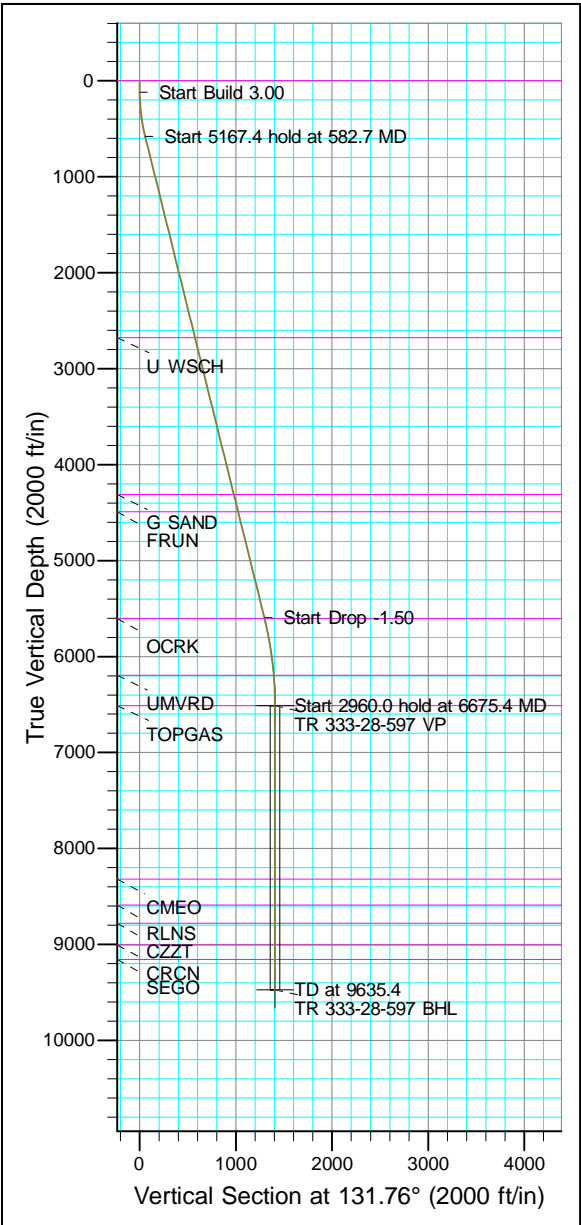
Project: Garfield County, CO (Nad 83)  
 Site: TR 32-28-597 Pad  
 Well: TR 333-28-597  
 Wellbore: OWB  
 Design: Plan



Azimuths to True North  
 Magnetic North: 9.23°  
 Magnetic Field  
 Strength: 51011.2nT  
 Dip Angle: 65.58°  
 Date: 6/6/2023  
 Model: HDGM

WELL DETAILS: TR 333-28-597

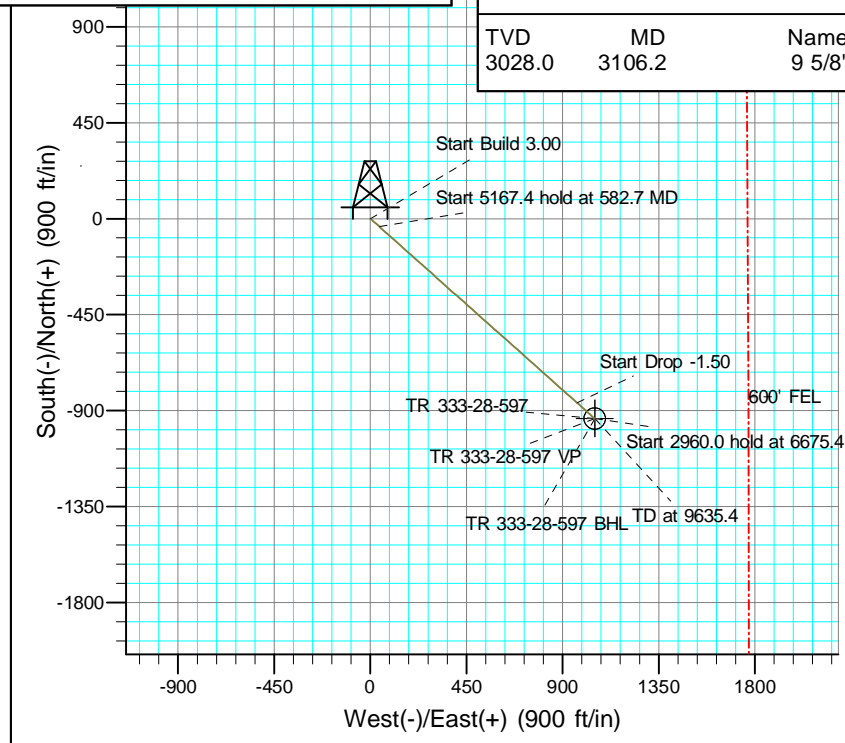
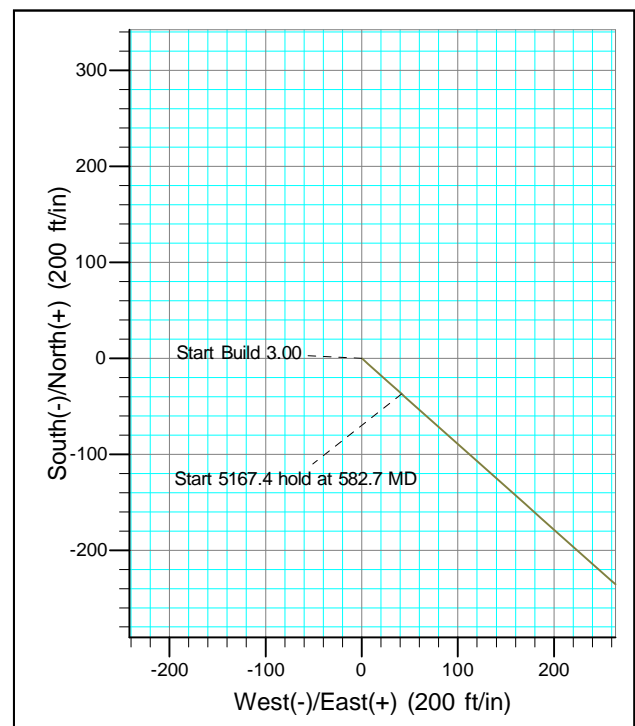
+N/-S	+E/-W	Northing	Ground Level: Easting	8483.0	Latitude	Longitude	Slot
0.0	0.0	1650686.200	2216044.600	39.586968	-108.282039	TR 333-28-597	



ANNOTATIONS								FORMATION TOP DETAILS			
TVD	MD	Inc	Azi	+N/-S	+E/-W	V Sect	Departure	Annotation	TVDPath	MDPath	Formation
120.0	120.0	0.00	0.00	0.0	0.0	0.0	0.0	Start Build 3.00	0.0	0.0	GRRV
578.2	582.7	13.88	131.76	-37.1	41.6	55.8	55.8	Start 5167.4 hold at 582.7 MD	2678.0	2745.7	U WSCH
5594.6	5750.1	13.88	131.76	-862.7	966.4	1295.4	1295.4	Start Drop -1.50	4312.0	4428.8	G SAND
6511.0	6675.4	0.00	0.00	-937.0	1049.6	1407.0	1407.0	Start 2960.0 hold at 6675.4 MD	4491.0	4613.2	FRUN
9471.0	9635.4	0.00	0.00	-937.0	1049.6	1407.0	1407.0	TD at 9635.4	5604.0	5759.7	OCRK
									6194.0	6358.1	UMVRD
									6511.0	6675.4	TOPGAS
									8320.0	8484.4	CMEO
									8590.0	8754.4	RLNS
									8777.0	8941.4	CZZT
									9005.0	9169.4	CRCN
									9155.0	9319.4	SEGO

DESIGN TARGET DETAILS								
Name	TVD	+N/-S	+E/-W	Northing	Easting	Latitude	Longitude	Shape
VP	6511.0	-937.0	1049.6	1649717.500	2217065.000	39.584396	-108.278315	Point
BHL	9471.0	-937.0	1049.6	1649717.500	2217065.000	39.584396	-108.278315	Circle (Radius: 50.0)

CASING DETAILS		
TVD	MD	Name
3028.0	3106.2	9 5/8"





# **Terra Energy Partners, LLP**

**Garfield County, CO (Nad 83)**

**TR 32-28-597 Pad**

**TR 333-28-597 - Slot TR 333-28-597**

**OWB**

**Plan: Plan**

## **Standard Planning Report**

**13 June, 2023**



<b>Database:</b>	NN	<b>Local Co-ordinate Reference:</b>	Well TR 333-28-597 - Slot TR 333-28-597
<b>Company:</b>	Terra Energy Partners, LLP	<b>TVD Reference:</b>	RKB @ 30' @ 8513.0ft
<b>Project:</b>	Garfield County, CO (Nad 83)	<b>MD Reference:</b>	RKB @ 30' @ 8513.0ft
<b>Site:</b>	TR 32-28-597 Pad	<b>North Reference:</b>	True
<b>Well:</b>	TR 333-28-597	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	OWB		
<b>Design:</b>	Plan		

<b>Project</b>	Garfield County, CO (Nad 83)		
<b>Map System:</b>	US State Plane 1983	<b>System Datum:</b>	Mean Sea Level
<b>Geo Datum:</b>	North American Datum 1983		
<b>Map Zone:</b>	Colorado Central Zone		

<b>Site</b>	TR 32-28-597 Pad, Sec 28, T5S, R97W				
<b>Site Position:</b>	<b>Northing:</b>	1,650,709.300 usft	<b>Latitude:</b>	39.587032	
<b>From:</b> Map	<b>Easting:</b>	2,216,053.200 usft	<b>Longitude:</b>	-108.282011	
<b>Position Uncertainty:</b>	0.0 ft	<b>Slot Radius:</b>	13-3/16 "	<b>Grid Convergence:</b>	-1.75 °

<b>Well</b>	TR 333-28-597 - Slot TR 333-28-597					
<b>Well Position</b>	<b>+N/-S</b>	-23.4 ft	<b>Northing:</b>	1,650,686.200 usft	<b>Latitude:</b>	39.586968
	<b>+E/-W</b>	-7.9 ft	<b>Easting:</b>	2,216,044.600 usft	<b>Longitude:</b>	-108.282039
<b>Position Uncertainty</b>		0.0 ft	<b>Wellhead Elevation:</b>	8,513.0 ft	<b>Ground Level:</b>	8,483.0 ft

<b>Wellbore</b>	OWB				
<b>Magnetics</b>	<b>Model Name</b>	<b>Sample Date</b>	<b>Declination (°)</b>	<b>Dip Angle (°)</b>	<b>Field Strength (nT)</b>
	HDGM	6/6/2023	9.23	65.58	51,011

<b>Design</b>	Plan			
<b>Audit Notes:</b>				
<b>Version:</b>	<b>Phase:</b>	PROTOTYPE	<b>Tie On Depth:</b>	0.0
<b>Vertical Section:</b>	<b>Depth From (TVD) (ft)</b>	<b>+N/-S (ft)</b>	<b>+E/-W (ft)</b>	<b>Direction (°)</b>
	0.0	0.0	0.0	131.76

<b>Plan Sections</b>										
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	TFO (°)	Target
0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.00	0.00	
120.0	0.00	0.00	120.0	0.0	0.0	0.00	0.00	0.00	0.00	
582.7	13.88	131.76	578.2	-37.1	41.6	3.00	3.00	0.00	131.76	
5,750.1	13.88	131.76	5,594.6	-862.7	966.4	0.00	0.00	0.00	0.00	
6,675.4	0.00	0.00	6,511.0	-937.0	1,049.6	1.50	-1.50	0.00	180.00	
9,635.4	0.00	0.00	9,471.0	-937.0	1,049.6	0.00	0.00	0.00	0.00	TR 333-28-597 BHL

<b>Database:</b>	NN	<b>Local Co-ordinate Reference:</b>	Well TR 333-28-597 - Slot TR 333-28-597
<b>Company:</b>	Terra Energy Partners, LLP	<b>TVD Reference:</b>	RKB @ 30' @ 8513.0ft
<b>Project:</b>	Garfield County, CO (Nad 83)	<b>MD Reference:</b>	RKB @ 30' @ 8513.0ft
<b>Site:</b>	TR 32-28-597 Pad	<b>North Reference:</b>	True
<b>Well:</b>	TR 333-28-597	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	OWB		
<b>Design:</b>	Plan		

Planned Survey										
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	
0.0	0.00	0.00	0.0	0.0	0.0	0.0	0.00	0.00	0.00	
100.0	0.00	0.00	100.0	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	
<b>Start Build 3.00</b>										
200.0	2.40	131.76	200.0	-1.1	1.2	1.7	3.00	3.00	0.00	
300.0	5.40	131.76	299.7	-5.6	6.3	8.5	3.00	3.00	0.00	
400.0	8.40	131.76	399.0	-13.6	15.3	20.5	3.00	3.00	0.00	
500.0	11.40	131.76	497.5	-25.1	28.1	37.7	3.00	3.00	0.00	
582.7	13.88	131.76	578.2	-37.1	41.6	55.8	3.00	3.00	0.00	
<b>Start 5167.4 hold at 582.7 MD</b>										
600.0	13.88	131.76	595.0	-39.9	44.7	59.9	0.00	0.00	0.00	
700.0	13.88	131.76	692.1	-55.9	62.6	83.9	0.00	0.00	0.00	
800.0	13.88	131.76	789.1	-71.9	80.5	107.9	0.00	0.00	0.00	
900.0	13.88	131.76	886.2	-87.8	98.4	131.9	0.00	0.00	0.00	
1,000.0	13.88	131.76	983.3	-103.8	116.3	155.9	0.00	0.00	0.00	
1,100.0	13.88	131.76	1,080.4	-119.8	134.2	179.9	0.00	0.00	0.00	
1,200.0	13.88	131.76	1,177.5	-135.8	152.1	203.9	0.00	0.00	0.00	
1,300.0	13.88	131.76	1,274.5	-151.7	170.0	227.9	0.00	0.00	0.00	
1,400.0	13.88	131.76	1,371.6	-167.7	187.9	251.8	0.00	0.00	0.00	
1,500.0	13.88	131.76	1,468.7	-183.7	205.8	275.8	0.00	0.00	0.00	
1,600.0	13.88	131.76	1,565.8	-199.7	223.7	299.8	0.00	0.00	0.00	
1,700.0	13.88	131.76	1,662.9	-215.7	241.6	323.8	0.00	0.00	0.00	
1,800.0	13.88	131.76	1,759.9	-231.6	259.5	347.8	0.00	0.00	0.00	
1,900.0	13.88	131.76	1,857.0	-247.6	277.4	371.8	0.00	0.00	0.00	
2,000.0	13.88	131.76	1,954.1	-263.6	295.3	395.8	0.00	0.00	0.00	
2,100.0	13.88	131.76	2,051.2	-279.6	313.1	419.8	0.00	0.00	0.00	
2,200.0	13.88	131.76	2,148.3	-295.5	331.0	443.8	0.00	0.00	0.00	
2,300.0	13.88	131.76	2,245.3	-311.5	348.9	467.8	0.00	0.00	0.00	
2,400.0	13.88	131.76	2,342.4	-327.5	366.8	491.8	0.00	0.00	0.00	
2,500.0	13.88	131.76	2,439.5	-343.5	384.7	515.7	0.00	0.00	0.00	
2,600.0	13.88	131.76	2,536.6	-359.4	402.6	539.7	0.00	0.00	0.00	
2,700.0	13.88	131.76	2,633.7	-375.4	420.5	563.7	0.00	0.00	0.00	
2,800.0	13.88	131.76	2,730.7	-391.4	438.4	587.7	0.00	0.00	0.00	
2,900.0	13.88	131.76	2,827.8	-407.4	456.3	611.7	0.00	0.00	0.00	
3,000.0	13.88	131.76	2,924.9	-423.3	474.2	635.7	0.00	0.00	0.00	
3,100.0	13.88	131.76	3,022.0	-439.3	492.1	659.7	0.00	0.00	0.00	
3,200.0	13.88	131.76	3,119.1	-455.3	510.0	683.7	0.00	0.00	0.00	
3,300.0	13.88	131.76	3,216.1	-471.3	527.9	707.7	0.00	0.00	0.00	
3,400.0	13.88	131.76	3,313.2	-487.3	545.8	731.7	0.00	0.00	0.00	
3,500.0	13.88	131.76	3,410.3	-503.2	563.7	755.6	0.00	0.00	0.00	
3,600.0	13.88	131.76	3,507.4	-519.2	581.6	779.6	0.00	0.00	0.00	
3,700.0	13.88	131.76	3,604.5	-535.2	599.5	803.6	0.00	0.00	0.00	
3,800.0	13.88	131.76	3,701.5	-551.2	617.4	827.6	0.00	0.00	0.00	
3,900.0	13.88	131.76	3,798.6	-567.1	635.3	851.6	0.00	0.00	0.00	
4,000.0	13.88	131.76	3,895.7	-583.1	653.2	875.6	0.00	0.00	0.00	
4,100.0	13.88	131.76	3,992.8	-599.1	671.1	899.6	0.00	0.00	0.00	
4,200.0	13.88	131.76	4,089.9	-615.1	689.0	923.6	0.00	0.00	0.00	
4,300.0	13.88	131.76	4,186.9	-631.0	706.9	947.6	0.00	0.00	0.00	
4,400.0	13.88	131.76	4,284.0	-647.0	724.8	971.6	0.00	0.00	0.00	
4,500.0	13.88	131.76	4,381.1	-663.0	742.7	995.5	0.00	0.00	0.00	
4,600.0	13.88	131.76	4,478.2	-679.0	760.6	1,019.5	0.00	0.00	0.00	
4,700.0	13.88	131.76	4,575.2	-695.0	778.5	1,043.5	0.00	0.00	0.00	
4,800.0	13.88	131.76	4,672.3	-710.9	796.3	1,067.5	0.00	0.00	0.00	
4,900.0	13.88	131.76	4,769.4	-726.9	814.2	1,091.5	0.00	0.00	0.00	

<b>Database:</b>	NN	<b>Local Co-ordinate Reference:</b>	Well TR 333-28-597 - Slot TR 333-28-597
<b>Company:</b>	Terra Energy Partners, LLP	<b>TVD Reference:</b>	RKB @ 30' @ 8513.0ft
<b>Project:</b>	Garfield County, CO (Nad 83)	<b>MD Reference:</b>	RKB @ 30' @ 8513.0ft
<b>Site:</b>	TR 32-28-597 Pad	<b>North Reference:</b>	True
<b>Well:</b>	TR 333-28-597	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	OWB		
<b>Design:</b>	Plan		

Planned Survey										
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	
5,000.0	13.88	131.76	4,866.5	-742.9	832.1	1,115.5	0.00	0.00	0.00	
5,100.0	13.88	131.76	4,963.6	-758.9	850.0	1,139.5	0.00	0.00	0.00	
5,200.0	13.88	131.76	5,060.6	-774.8	867.9	1,163.5	0.00	0.00	0.00	
5,300.0	13.88	131.76	5,157.7	-790.8	885.8	1,187.5	0.00	0.00	0.00	
5,400.0	13.88	131.76	5,254.8	-806.8	903.7	1,211.5	0.00	0.00	0.00	
5,500.0	13.88	131.76	5,351.9	-822.8	921.6	1,235.4	0.00	0.00	0.00	
5,600.0	13.88	131.76	5,449.0	-838.7	939.5	1,259.4	0.00	0.00	0.00	
5,700.0	13.88	131.76	5,546.0	-854.7	957.4	1,283.4	0.00	0.00	0.00	
5,750.1	13.88	131.76	5,594.6	-862.7	966.4	1,295.4	0.00	0.00	0.00	
<b>Start Drop -1.50</b>										
5,800.0	13.13	131.76	5,643.2	-870.5	975.1	1,307.1	1.50	-1.50	0.00	
5,900.0	11.63	131.76	5,740.9	-884.8	991.1	1,328.5	1.50	-1.50	0.00	
6,000.0	10.13	131.76	5,839.1	-897.3	1,005.2	1,347.4	1.50	-1.50	0.00	
6,100.0	8.63	131.76	5,937.7	-908.2	1,017.3	1,363.7	1.50	-1.50	0.00	
6,200.0	7.13	131.76	6,036.8	-917.3	1,027.5	1,377.4	1.50	-1.50	0.00	
6,300.0	5.63	131.76	6,136.2	-924.7	1,035.8	1,388.5	1.50	-1.50	0.00	
6,400.0	4.13	131.76	6,235.8	-930.4	1,042.2	1,397.1	1.50	-1.50	0.00	
6,500.0	2.63	131.76	6,335.6	-934.3	1,046.6	1,403.0	1.50	-1.50	0.00	
6,600.0	1.13	131.76	6,435.6	-936.5	1,049.0	1,406.2	1.50	-1.50	0.00	
6,675.4	0.00	0.00	6,511.0	-937.0	1,049.6	1,407.0	1.50	-1.50	0.00	
<b>Start 2960.0 hold at 6675.4 MD</b>										
6,700.0	0.00	0.00	6,535.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
6,800.0	0.00	0.00	6,635.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
6,900.0	0.00	0.00	6,735.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
7,000.0	0.00	0.00	6,835.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
7,100.0	0.00	0.00	6,935.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
7,200.0	0.00	0.00	7,035.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
7,300.0	0.00	0.00	7,135.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
7,400.0	0.00	0.00	7,235.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
7,500.0	0.00	0.00	7,335.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
7,600.0	0.00	0.00	7,435.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
7,700.0	0.00	0.00	7,535.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
7,800.0	0.00	0.00	7,635.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
7,900.0	0.00	0.00	7,735.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
8,000.0	0.00	0.00	7,835.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
8,100.0	0.00	0.00	7,935.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
8,200.0	0.00	0.00	8,035.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
8,300.0	0.00	0.00	8,135.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
8,400.0	0.00	0.00	8,235.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
8,500.0	0.00	0.00	8,335.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
8,600.0	0.00	0.00	8,435.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
8,700.0	0.00	0.00	8,535.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
8,800.0	0.00	0.00	8,635.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
8,900.0	0.00	0.00	8,735.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
9,000.0	0.00	0.00	8,835.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
9,100.0	0.00	0.00	8,935.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
9,200.0	0.00	0.00	9,035.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
9,300.0	0.00	0.00	9,135.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
9,400.0	0.00	0.00	9,235.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
9,500.0	0.00	0.00	9,335.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
9,600.0	0.00	0.00	9,435.6	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
9,635.4	0.00	0.00	9,471.0	-937.0	1,049.6	1,407.0	0.00	0.00	0.00	
<b>TD at 9635.4</b>										

<b>Database:</b>	NN	<b>Local Co-ordinate Reference:</b>	Well TR 333-28-597 - Slot TR 333-28-597
<b>Company:</b>	Terra Energy Partners, LLP	<b>TVD Reference:</b>	RKB @ 30' @ 8513.0ft
<b>Project:</b>	Garfield County, CO (Nad 83)	<b>MD Reference:</b>	RKB @ 30' @ 8513.0ft
<b>Site:</b>	TR 32-28-597 Pad	<b>North Reference:</b>	True
<b>Well:</b>	TR 333-28-597	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	OWB		
<b>Design:</b>	Plan		

Design Targets									
Target Name	Dip Angle (°)	Dip Dir. (°)	TVD (ft)	+N/-S (ft)	+E/-W (ft)	Northing (usft)	Easting (usft)	Latitude	Longitude
TR 333-28-597 VP - hit/miss target - Shape - plan hits target center - Point	0.00	0.00	6,511.0	-937.0	1,049.6	1,649,717.500	2,217,065.000	39.584396	-108.278315
TR 333-28-597 BHL - plan hits target center - Circle (radius 50.0)	0.00	0.00	9,471.0	-937.0	1,049.6	1,649,717.500	2,217,065.000	39.584396	-108.278315

Casing Points					
Measured Depth (ft)	Vertical Depth (ft)	Name	Casing Diameter (")	Hole Diameter (")	
3,106.2	3,028.0	9 5/8"	9-5/8	12-1/4	

Formations						
Measured Depth (ft)	Vertical Depth (ft)	Name	Lithology	Dip (°)	Dip Direction (°)	
0.0	0.0	GRRV		0.00		
2,745.7	2,678.0	U WSCH		0.00		
4,428.8	4,312.0	G SAND		0.00		
4,613.2	4,491.0	FRUN		0.00		
5,759.7	5,604.0	OCRK		0.00		
6,358.1	6,194.0	UMVRD		0.00		
6,675.4	6,511.0	TOPGAS		0.00		
8,484.4	8,320.0	CMEO		0.00		
8,754.4	8,590.0	RLNS		0.00		
8,941.4	8,777.0	CZZT		0.00		
9,169.4	9,005.0	CRCN		0.00		
9,319.4	9,155.0	SEGO		0.00		

Plan Annotations					
Measured Depth (ft)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Comment	
120.0	120.0	0.0	0.0	Start Build 3.00	
582.7	578.2	-37.1	41.6	Start 5167.4 hold at 582.7 MD	
5,750.1	5,594.6	-862.7	966.4	Start Drop -1.50	
6,675.4	6,511.0	-937.0	1,049.6	Start 2960.0 hold at 6675.4 MD	
9,635.4	9,471.0	-937.0	1,049.6	TD at 9635.4	