

Project: Eddy County (NAD83)
Site: Dee
Well: Dee State Com #1H
Wellbore: Lateral #1
Design: Plan #3
Ground Elevation 3630.000
Northing 586558.10
Easting 474720.90

PROJECT DETAILS: Eddy County (NAD83)
Geodetic System: US State Plane 1983
Datum: North American Datum 1983
Ellipsoid: GRS 1980
Zone: New Mexico Eastern Zone
System Datum: Mean Sea Level



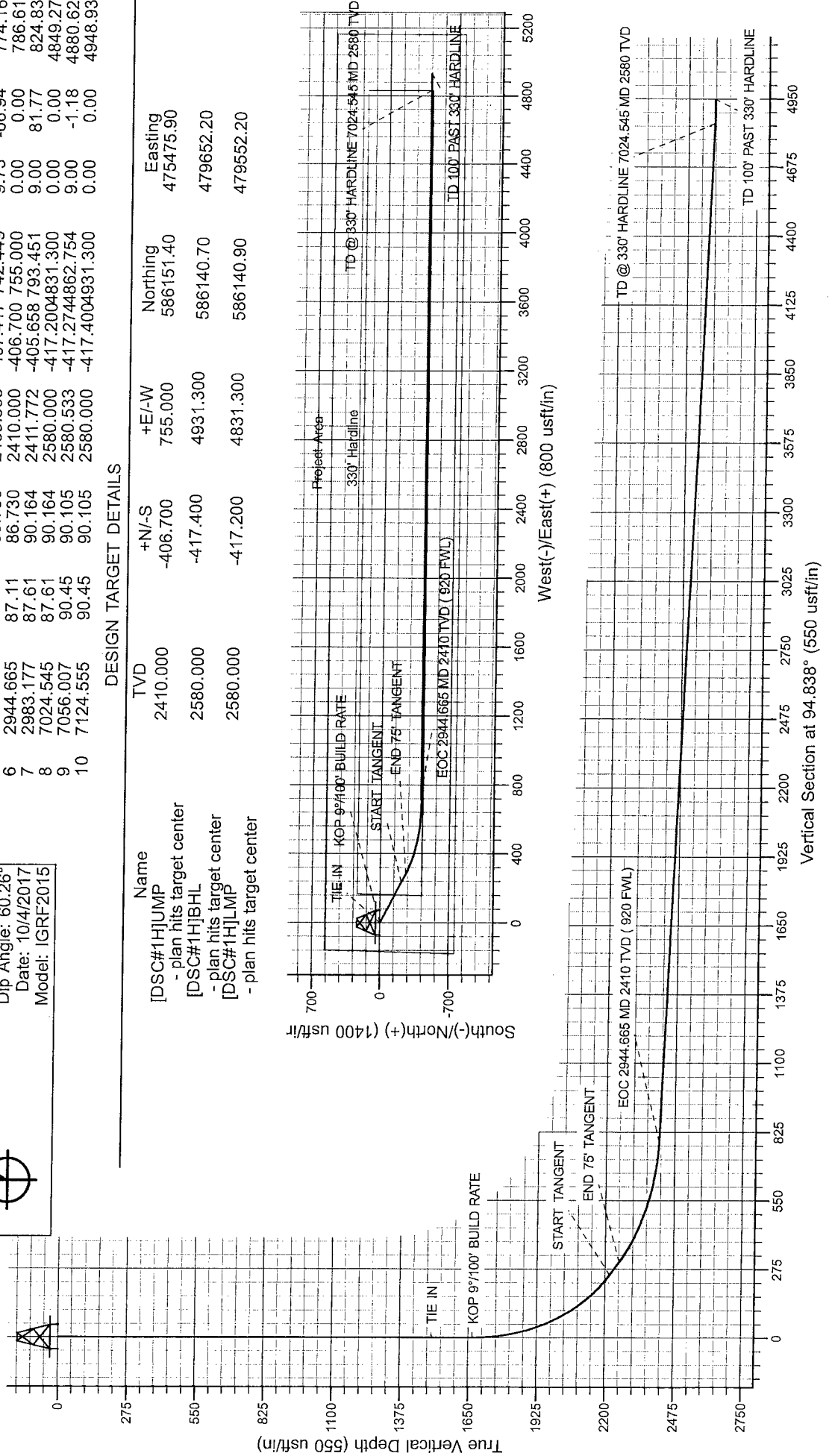
Azimuths to Grid North
True North: 0.12°
Magnetic North: 7.52°
Magnetic Field
Strength: 48029.7nT
Dip Angle: 60.26°
Date: 10/4/2017
Model: [GRF2015]

SECTION DETAILS

Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	Vsect
1	1500.000	0.00	0.000	1500.000	0.000	0.000	0.00	0.00	0.000
2	1665.795	0.00	0.000	1665.795	0.000	0.000	0.00	0.00	0.000
3	2332.462	60.00	132.500	2217.124	-215.047	234.683	9.00	132.50	251.984
4	2407.462	60.00	132.500	2254.624	-258.928	282.570	9.00	132.50	303.402
5	2932.077	87.11	86.730	2409.366	-407.417	742.449	9.73	-66.94	774.165
6	2944.665	87.11	86.730	2410.000	-406.700	755.000	9.00	0.00	786.612
7	2983.177	87.61	90.164	2411.772	-405.658	793.451	9.00	81.77	824.837
8	7024.545	87.61	90.164	2580.000	-417.200	4831.300	9.00	0.00	4849.273
9	7056.007	90.45	90.105	2580.533	-417.274	4862.754	9.00	-1.18	4880.621
10	7124.555	90.45	90.105	2580.000	-417.400	4931.300	9.00	0.00	4948.933

DESIGN TARGET DETAILS

Name	TVD	+N/-S	+E/-W	Northing	Easting
[DSC#1H]JUMP - plan hits target center	2410.000	-406.700	755.000	586151.40	475475.90
[DSC#1H]JBHL - plan hits target center	2580.000	-417.400	4931.300	586140.70	479652.20
[DSC#1H]JMP - plan hits target center	2580.000	-417.200	4831.300	586140.90	479552.20





NM OIL CONSERVATION

ARTESIA DISTRICT

NOV 14 2017

RECEIVED

EOG Resources - Artesia

Eddy County (NAD83)

Dee

Dee State Com #1H

Lateral #1

Plan: Plan #3

Standard Planning Report

10 November, 2017



Planning Report

Database: EDM 5000.14
Company: EOG Resources - Artesia
Project: Eddy County (NAD83)
Site: Dee
Well: Dee State Com #1H
Wellbore: Lateral #1
Design: Plan #3

Local Co-ordinate Reference: Well Dee State Com #1H
TVD Reference: KB @ 3648.000usft
MD Reference: KB @ 3648.000usft
North Reference: Grid
Survey Calculation Method: Minimum Curvature

Project: Eddy County (NAD83)
Map System: US State Plane 1983
Geo Datum: North American Datum 1983
Map Zone: New Mexico Eastern Zone

System Datum: Mean Sea Level

Site: Dee

Site Position: Northing: 586,558.10 usft Latitude: 32.612
From: Map Easting: 474,720.90 usft Longitude: -104.550
Position Uncertainty: 0.000 usft Slot Radius: 13-3/16 " Grid Convergence: -0.12 °

Well: Dee State Com #1H

Well Position: +N/-S 0.000 usft Northing: 586,558.10 usft Latitude: 32.612
+E/-W 0.000 usft Easting: 474,720.90 usft Longitude: -104.550
Position Uncertainty: 0.000 usft Wellhead Elevation: 3,648.000 usft Ground Level: 3,630.000 usft

Wellbore: Lateral #1

Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2015	10/4/2017	7.40	60.26	48,029.66305603

Design: Plan #3

Audit Notes:

Version: Phase: PROTOTYPE Tie On Depth: 1,500.000

Vertical Section:	Depth From (TVD) (usft)	+N/-S (usft)	+E/-W (usft)	Direction (°)
	0.000	0.000	0.000	94.838

Plan Survey Tool Program Date 11/10/2017

Depth From (usft)	Depth To (usft)	Survey (Wellbore)	Tool Name	Remarks
1 1,500.000	7,124.555	Plan #3 (Lateral #1)	MWD OWSG MWD - Standard	



Planning Report

Database: EDM 5000.14
Company: EOG Resources - Artesia
Project: Eddy County (NAD83)
Site: Dee
Well: Dee State Com #1H
Wellbore: Lateral #1
Design: Plan #3

Local Co-ordinate Reference: Well Dee State Com #1H
TVD Reference: KB @ 3648.000usft
MD Reference: KB @ 3648.000usft
North Reference: Grid
Survey Calculation Method: Minimum Curvature

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
1,500.000	0.00	0.000	1,500.000	0.000	0.000	0.00	0.00	0.00	0.00	
1,665.795	0.00	0.000	1,665.795	0.000	0.000	0.00	0.00	0.00	0.00	
2,332.462	60.00	132.500	2,217.124	-215.047	234.683	9.00	9.00	0.00	132.50	
2,407.462	60.00	132.500	2,254.624	-258.928	282.570	0.00	0.00	0.00	0.00	
2,932.077	87.11	86.730	2,409.366	-407.417	742.448	9.73	5.17	-8.72	-66.94	
2,944.665	87.11	86.730	2,410.000	-406.700	755.000	0.00	0.00	0.00	0.00	[DSC#1H]JUMP
2,983.176	87.61	90.164	2,411.772	-405.658	793.451	9.00	1.30	8.92	81.77	
7,024.545	87.61	90.164	2,580.000	-417.200	4,831.300	0.00	0.00	0.00	0.00	[DSC#1H]LMP
7,056.007	90.45	90.105	2,580.533	-417.274	4,862.754	9.00	9.00	-0.19	-1.18	
7,124.555	90.45	90.105	2,580.000	-417.400	4,931.300	0.00	0.00	0.00	0.00	[DSC#1H]BHL



Planning Report

Database: EDM 5000.14
Company: EOG Resources - Artesia
Project: Eddy County (NAD83)
Site: Dee
Well: Dee State Com #1H
Wellbore: Lateral #1
Design: Plan #3

Local Co-ordinate Reference: Well Dee State Com #1H
TVD Reference: KB @ 3648.000usft
MD Reference: KB @ 3648.000usft
North Reference: Grid
Survey Calculation Method: Minimum Curvature

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)
0.000	0.00	0.000	0.000	0.000	0.000	0.000	0.00	0.00	0.00
100.000	0.00	0.000	100.000	0.000	0.000	0.000	0.00	0.00	0.00
200.000	0.00	0.000	200.000	0.000	0.000	0.000	0.00	0.00	0.00
300.000	0.00	0.000	300.000	0.000	0.000	0.000	0.00	0.00	0.00
400.000	0.00	0.000	400.000	0.000	0.000	0.000	0.00	0.00	0.00
500.000	0.00	0.000	500.000	0.000	0.000	0.000	0.00	0.00	0.00
600.000	0.00	0.000	600.000	0.000	0.000	0.000	0.00	0.00	0.00
700.000	0.00	0.000	700.000	0.000	0.000	0.000	0.00	0.00	0.00
800.000	0.00	0.000	800.000	0.000	0.000	0.000	0.00	0.00	0.00
900.000	0.00	0.000	900.000	0.000	0.000	0.000	0.00	0.00	0.00
1,000.000	0.00	0.000	1,000.000	0.000	0.000	0.000	0.00	0.00	0.00
1,100.000	0.00	0.000	1,100.000	0.000	0.000	0.000	0.00	0.00	0.00
1,200.000	0.00	0.000	1,200.000	0.000	0.000	0.000	0.00	0.00	0.00
1,300.000	0.00	0.000	1,300.000	0.000	0.000	0.000	0.00	0.00	0.00
1,400.000	0.00	0.000	1,400.000	0.000	0.000	0.000	0.00	0.00	0.00
1,500.000	0.00	0.000	1,500.000	0.000	0.000	0.000	0.00	0.00	0.00
1,600.000	0.00	0.000	1,600.000	0.000	0.000	0.000	0.00	0.00	0.00
1,665.795	0.00	0.000	1,665.795	0.000	0.000	0.000	0.00	0.00	0.00
1,700.000	3.08	132.500	1,699.983	-0.621	0.677	0.727	9.00	9.00	0.00
1,750.000	7.58	132.500	1,749.755	-3.757	4.100	4.402	9.00	9.00	0.00
1,800.000	12.08	132.500	1,799.008	-9.521	10.391	11.157	9.00	9.00	0.00
1,850.000	16.58	132.500	1,847.440	-17.879	19.512	20.950	9.00	9.00	0.00
1,900.000	21.08	132.500	1,894.753	-28.778	31.406	33.721	9.00	9.00	0.00
1,950.000	25.58	132.500	1,940.653	-42.151	46.000	49.391	9.00	9.00	0.00
2,000.000	30.08	132.500	1,984.859	-57.916	63.205	67.864	9.00	9.00	0.00
2,050.000	34.58	132.500	2,027.098	-75.976	82.913	89.026	9.00	9.00	0.00
2,100.000	39.08	132.500	2,067.110	-96.219	105.005	112.746	9.00	9.00	0.00
2,150.000	43.58	132.500	2,104.647	-118.521	129.342	138.878	9.00	9.00	0.00
2,200.000	48.08	132.500	2,139.478	-142.743	155.776	167.261	9.00	9.00	0.00
2,250.000	52.58	132.500	2,171.389	-168.737	184.144	197.719	9.00	9.00	0.00
2,300.000	57.08	132.500	2,200.183	-196.342	214.270	230.066	9.00	9.00	0.00
2,332.462	60.00	132.500	2,217.124	-215.047	234.683	251.984	9.00	9.00	0.00
2,407.462	60.00	132.500	2,254.624	-258.928	282.570	303.402	0.00	0.00	0.00
2,450.000	61.69	128.173	2,275.353	-282.956	310.884	333.641	9.73	3.98	-10.17
2,500.000	63.85	123.266	2,298.240	-308.884	346.973	371.788	9.73	4.31	-9.81
2,550.000	66.17	118.544	2,319.372	-332.135	385.848	412.486	9.73	4.63	-9.44
2,600.000	68.62	113.993	2,338.598	-352.541	427.231	455.442	9.73	4.91	-9.10
2,650.000	71.20	109.595	2,355.778	-369.955	470.821	500.346	9.73	5.15	-8.80
2,700.000	73.87	105.332	2,370.789	-384.251	516.305	546.873	9.73	5.35	-8.53
2,750.000	76.63	101.185	2,383.522	-395.326	563.355	594.690	9.73	5.51	-8.30
2,800.000	79.45	97.132	2,393.886	-403.100	611.632	643.450	9.73	5.65	-8.11
2,850.000	82.33	93.154	2,401.806	-407.517	660.787	692.803	9.73	5.75	-7.96
2,900.000	85.23	89.229	2,407.225	-408.546	710.467	742.393	9.73	5.82	-7.85
2,932.077	87.11	86.730	2,409.366	-407.417	742.448	774.165	9.73	5.86	-7.79
2,944.665	87.11	86.730	2,410.000	-406.700	755.000	786.611	0.00	0.00	0.00
2,950.000	87.18	87.206	2,410.265	-406.418	760.321	791.890	9.00	1.29	8.92
2,983.176	87.61	90.164	2,411.772	-405.658	793.451	824.837	9.00	1.30	8.91
3,000.000	87.61	90.164	2,412.472	-405.706	810.260	841.590	0.00	0.00	0.00
3,100.000	87.61	90.164	2,416.635	-405.991	910.172	941.171	0.00	0.00	0.00
3,200.000	87.61	90.164	2,420.797	-406.277	1,010.085	1,040.752	0.00	0.00	0.00
3,300.000	87.61	90.164	2,424.960	-406.563	1,109.998	1,140.333	0.00	0.00	0.00
3,400.000	87.61	90.164	2,429.123	-406.848	1,209.911	1,239.914	0.00	0.00	0.00
3,500.000	87.61	90.164	2,433.285	-407.134	1,309.824	1,339.495	0.00	0.00	0.00
3,600.000	87.61	90.164	2,437.448	-407.419	1,409.737	1,439.076	0.00	0.00	0.00



Planning Report

Database: EDM 5000.14
Company: EOG Resources - Artesia
Project: Eddy County (NAD83)
Site: Dee
Well: Dee State Com #1H
Wellbore: Lateral #1
Design: Plan #3

Local Co-ordinate Reference: Well Dee State Com #1H
TVD Reference: KB @ 3648.000usft
MD Reference: KB @ 3648.000usft
North Reference: Grid
Survey Calculation Method: Minimum Curvature

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)
3,700.000	87.61	90.164	2,441.611	-407.705	1,509.650	1,538.657	0.00	0.00	0.00
3,800.000	87.61	90.164	2,445.773	-407.991	1,609.563	1,638.238	0.00	0.00	0.00
3,900.000	87.61	90.164	2,449.936	-408.276	1,709.476	1,737.819	0.00	0.00	0.00
4,000.000	87.61	90.164	2,454.098	-408.562	1,809.389	1,837.400	0.00	0.00	0.00
4,100.000	87.61	90.164	2,458.261	-408.847	1,909.302	1,936.981	0.00	0.00	0.00
4,200.000	87.61	90.164	2,462.424	-409.133	2,009.214	2,036.562	0.00	0.00	0.00
4,300.000	87.61	90.164	2,466.586	-409.419	2,109.127	2,136.143	0.00	0.00	0.00
4,400.000	87.61	90.164	2,470.749	-409.704	2,209.040	2,235.724	0.00	0.00	0.00
4,500.000	87.61	90.164	2,474.912	-409.990	2,308.953	2,335.305	0.00	0.00	0.00
4,600.000	87.61	90.164	2,479.074	-410.275	2,408.866	2,434.886	0.00	0.00	0.00
4,700.000	87.61	90.164	2,483.237	-410.561	2,508.779	2,534.467	0.00	0.00	0.00
4,800.000	87.61	90.164	2,487.400	-410.847	2,608.692	2,634.048	0.00	0.00	0.00
4,900.000	87.61	90.164	2,491.562	-411.132	2,708.605	2,733.629	0.00	0.00	0.00
5,000.000	87.61	90.164	2,495.725	-411.418	2,808.518	2,833.210	0.00	0.00	0.00
5,100.000	87.61	90.164	2,499.888	-411.703	2,908.431	2,932.791	0.00	0.00	0.00
5,200.000	87.61	90.164	2,504.050	-411.989	3,008.344	3,032.372	0.00	0.00	0.00
5,300.000	87.61	90.164	2,508.213	-412.275	3,108.256	3,131.953	0.00	0.00	0.00
5,400.000	87.61	90.164	2,512.376	-412.560	3,208.169	3,231.534	0.00	0.00	0.00
5,500.000	87.61	90.164	2,516.538	-412.846	3,308.082	3,331.115	0.00	0.00	0.00
5,600.000	87.61	90.164	2,520.701	-413.131	3,407.995	3,430.696	0.00	0.00	0.00
5,700.000	87.61	90.164	2,524.864	-413.417	3,507.908	3,530.277	0.00	0.00	0.00
5,800.000	87.61	90.164	2,529.026	-413.703	3,607.821	3,629.858	0.00	0.00	0.00
5,900.000	87.61	90.164	2,533.189	-413.988	3,707.734	3,729.439	0.00	0.00	0.00
6,000.000	87.61	90.164	2,537.352	-414.274	3,807.647	3,829.020	0.00	0.00	0.00
6,100.000	87.61	90.164	2,541.514	-414.559	3,907.560	3,928.601	0.00	0.00	0.00
6,200.000	87.61	90.164	2,545.677	-414.845	4,007.473	4,028.182	0.00	0.00	0.00
6,300.000	87.61	90.164	2,549.840	-415.131	4,107.386	4,127.763	0.00	0.00	0.00
6,400.000	87.61	90.164	2,554.002	-415.416	4,207.298	4,227.344	0.00	0.00	0.00
6,500.000	87.61	90.164	2,558.165	-415.702	4,307.211	4,326.925	0.00	0.00	0.00
6,600.000	87.61	90.164	2,562.328	-415.987	4,407.124	4,426.506	0.00	0.00	0.00
6,700.000	87.61	90.164	2,566.490	-416.273	4,507.037	4,526.087	0.00	0.00	0.00
6,800.000	87.61	90.164	2,570.653	-416.559	4,606.950	4,625.668	0.00	0.00	0.00
6,900.000	87.61	90.164	2,574.815	-416.844	4,706.863	4,725.249	0.00	0.00	0.00
7,000.000	87.61	90.164	2,578.978	-417.130	4,806.776	4,824.830	0.00	0.00	0.00
7,024.545	87.61	90.164	2,580.000	-417.200	4,831.300	4,849.273	0.00	0.00	0.00
7,050.000	89.90	90.117	2,580.551	-417.262	4,856.747	4,874.634	9.00	9.00	-0.19
7,056.007	90.45	90.105	2,580.533	-417.274	4,862.754	4,880.621	9.00	9.00	-0.19
7,100.000	90.45	90.105	2,580.191	-417.355	4,906.745	4,924.463	0.00	0.00	0.00
7,124.555	90.45	90.105	2,580.000	-417.400	4,931.300	4,948.933	0.00	0.00	0.00



Planning Report

Database: EDM 5000.14
Company: EOG Resources - Artesia
Project: Eddy County (NAD83)
Site: Dee
Well: Dee State Com #1H
Wellbore: Lateral #1
Design: Plan #3

Local Co-ordinate Reference: Well Dee State Com #1H
TVD Reference: KB @ 3648.000usft
MD Reference: KB @ 3648.000usft
North Reference: Grid
Survey Calculation Method: Minimum Curvature

Design Targets

Target Name - hit/miss target - Shape	Dip Angle (°)	Dip Dir. (°)	TVD (usft)	+N/-S (usft)	+E/-W (usft)	Northing (usft)	Easting (usft)	Latitude	Longitude
[DSC#1H]UMP - plan hits target center - Point	0.00	0.000	2,410.000	-406.700	755.000	586,151.40	475,475.90	32.611	-104.547
[DSC#1H]LMP - plan hits target center - Point	0.00	0.000	2,580.000	-417.200	4,831.300	586,140.90	479,552.20	32.611	-104.534
[DSC#1H]BHL - plan hits target center - Point	0.00	0.000	2,580.000	-417.400	4,931.300	586,140.70	479,652.20	32.611	-104.534

Casing Points

Measured Depth (usft)	Vertical Depth (usft)	Name	Casing Diameter (")	Hole Diameter (")
1,400.000	1,400.000	9 5/8"	9-5/8	12-1/4

Plan Annotations

Measured Depth (usft)	Vertical Depth (usft)	Local Coordinates		Comment
		+N/-S (usft)	+E/-W (usft)	
1,500.000	1,500.000	0.000	0.000	TIE IN
1,665.795	1,665.795	0.000	0.000	KOP 9°/100' BUILD RATE
2,332.462	2,217.124	-215.047	234.683	START TANGENT
2,407.462	2,254.624	-258.928	282.570	END 75' TANGENT
2,944.665	2,410.000	-407.417	742.448	EOC 2944.665 MD 2410 TVD (920 FWL)
7,024.545	2,580.000	-406.700	755.000	TD @ 330' HARDLINE 7024.545 MD 2580 TVD
7,124.555	2,580.000	-405.658	793.451	TD 100' PAST 330' HARDLINE