

HOBBS OCC
FEB 13 2018
RECEIVED



Lea County, NM (NAD 83 NME)
Neptune 10 State Com #708H
Plan #0.1

PROJECT DETAILS: Lea County, NM (NAD 83 NME)

Geodetic System: US State Plane 1983
Datum: North American Datum 1983
Ellipsoid: GRS 1980
Zone: New Mexico Eastern Zone
System Datum: Mean Sea Level

WELL DETAILS: #708H

KB = 25' @ 3634.0uoft 3609.6
Northing 446491.90 Easting 780879.00 Latitude 32°13' 30.383 N Longitude 103° 33' 51.323 W

Azimuths to Grid North
True North: -0.41°
Magnetic North: 6.48°

Magnetic Field
Strength: 47872.0nT
Dip Angle: 60.08°
Date: 2/9/2018
Model: IGRF2015

To convert a Magnetic Direction to a Grid Direction, Add 6.48°
To convert a Magnetic Direction to a True Direction, Add 6.88° East
To convert a True Direction to a Grid Direction, Subtract 0.41°

SECTION DETAILS

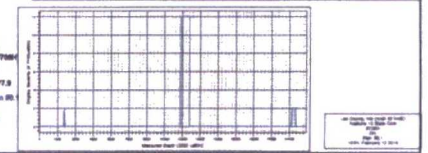
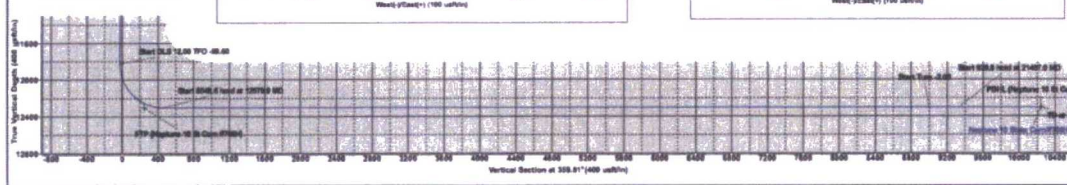
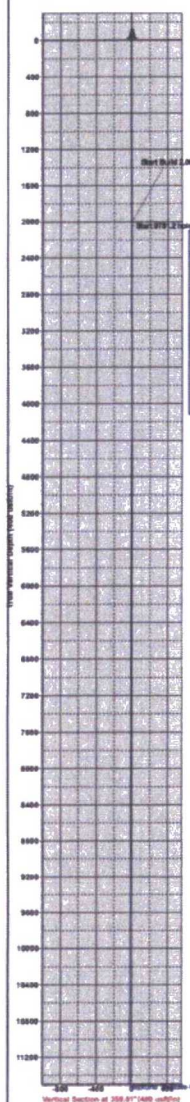
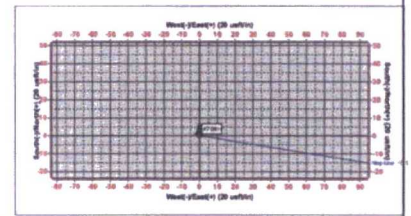
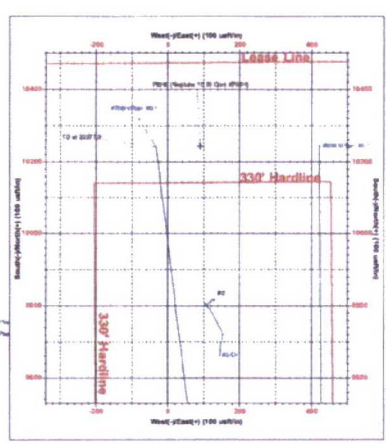
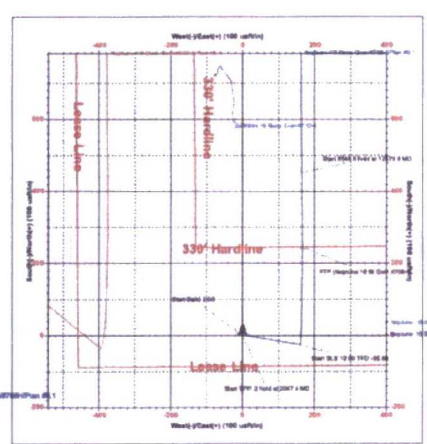
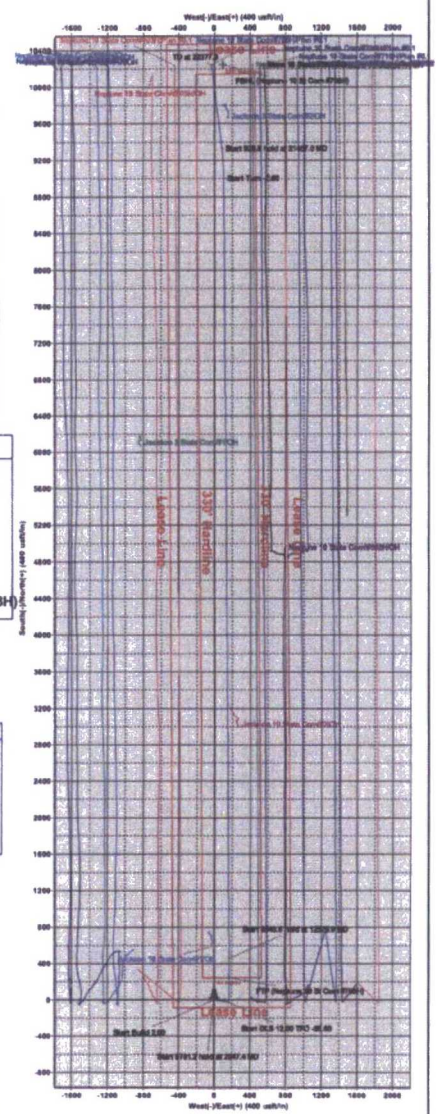
Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	Vsect	Target
1	0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.0	
2	2000.0	0.00	0.00	2000.0	0.0	0.0	0.00	0.00	0.0	
3	2047.4	0.95	99.17	2047.4	-0.1	0.4	2.00	99.17	-0.1	
4	11828.6	0.95	99.17	11827.3	-25.9	160.2	0.00	0.00	-26.4	
5	12579.9	90.00	359.57	12306.0	451.6	164.5	12.00	-99.60	451.1	
6	21128.5	90.00	359.57	12306.0	9000.0	100.3	0.00	0.00	8999.6	
7	21457.0	90.00	353.00	12306.0	9327.6	79.0	2.00	-90.00	9327.3	
8	22379.0	90.00	353.00	12306.0	10242.7	-33.3	0.00	0.00	10242.8	PBHL (Neptune 10 St Com #708H)

CASING DETAILS

No casing data is available

WELLBORE TARGET DETAILS (MAP CO-ORDINATES)

Name	TVD	+N/-S	+E/-W	Northing	Easting
PTP (Neptune 10 St Com #708H)	12306.0	244.0	166.0	446735.00	781045.00
PBHL (Neptune 10 St Com #708H)	12306.0	10242.8	91.0	4468733.00	780879.00





EOG Resources - Midland

Lea County, NM (NAD 83 NME)

Neptune 10 State Com

#708H

OH

Plan: Plan #0.1

Standard Planning Report

12 February, 2018



Planning Report

Database: EDM 5000.14
Company: EOG Resources - Midland
Project: Lea County, NM (NAD 83 NME)
Site: Neptune 10 State Com
Well: #708H
Wellbore: OH
Design: Plan #0.1

Local Co-ordinate Reference: Well #708H
TVD Reference: KB = 25' @ 3634.0usft
MD Reference: KB = 25' @ 3634.0usft
North Reference: Grid
Survey Calculation Method: Minimum Curvature

Project Lea County, NM (NAD 83 NME)

Map System: US State Plane 1983
Geo Datum: North American Datum 1983
Map Zone: New Mexico Eastern Zone
System Datum: Mean Sea Level

Site Neptune 10 State Com

Site Position: Northing: 446,557.00 usft Latitude: 32° 13' 31.172 N
From: Map Easting: 778,964.00 usft Longitude: 103° 33' 53.609 W
Position Uncertainty: 0.0 usft Slot Radius: 13-3/16 " Grid Convergence: 0.41 °

Well #708H

Well Position +N/-S -66.0 usft Northing: 446,491.00 usft Latitude: 32° 13' 30.383 N
 +E/-W 1,915.0 usft Easting: 780,879.00 usft Longitude: 103° 33' 31.323 W
Position Uncertainty 0.0 usft Wellhead Elevation: Ground Level: 3,609.0 usft

Wellbore OH

Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2015	2/9/2018	6.88	60.06	47,872.01614685

Design Plan #0.1

Audit Notes:

Version: Phase: PLAN Tie On Depth: 0.0

Vertical Section:	Depth From (TVD) (usft)	+N/-S (usft)	+E/-W (usft)	Direction (°)
	0.0	0.0	0.0	359.81

Plan Survey Tool Program Date 2/12/2018

Depth From (usft)	Depth To (usft)	Survey (Wellbore)	Tool Name	Remarks
1	0.0	22,379.0 Plan #0.1 (OH)	MWD	
			MWD - Standard	

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
0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.00	0.00	
2,000.0	0.00	0.00	2,000.0	0.0	0.0	0.00	0.00	0.00	0.00	
2,047.4	0.95	99.17	2,047.4	-0.1	0.4	2.00	2.00	0.00	99.17	
11,828.6	0.95	99.17	11,827.3	-25.9	160.2	0.00	0.00	0.00	0.00	
12,579.9	90.00	359.57	12,306.0	451.6	164.5	12.00	11.85	-13.26	-99.60	
21,128.5	90.00	359.57	12,306.0	9,000.0	100.3	0.00	0.00	0.00	0.00	
21,457.0	90.00	353.00	12,306.0	9,327.6	79.0	2.00	0.00	-2.00	-90.00	
22,379.0	90.00	353.00	12,306.0	10,242.7	-33.3	0.00	0.00	0.00	0.00	PBHL (Neptune 10 St



Planning Report

Database: EDM 5000.14
 Company: EOG Resources - Midland
 Project: Lea County, NM (NAD 83 NME)
 Site: Neptune 10 State Com
 Well: #708H
 Wellbore: OH
 Design: Plan #0.1

Local Co-ordinate Reference: Well #708H
 TVD Reference: KB = 25' @ 3634.0usft
 MD Reference: KB = 25' @ 3634.0usft
 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)
0.0	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
200.0	0.00	0.00	200.0	0.0	0.0	0.0	0.00	0.00	0.00
300.0	0.00	0.00	300.0	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
500.0	0.00	0.00	500.0	0.0	0.0	0.0	0.00	0.00	0.00
600.0	0.00	0.00	600.0	0.0	0.0	0.0	0.00	0.00	0.00
700.0	0.00	0.00	700.0	0.0	0.0	0.0	0.00	0.00	0.00
800.0	0.00	0.00	800.0	0.0	0.0	0.0	0.00	0.00	0.00
900.0	0.00	0.00	900.0	0.0	0.0	0.0	0.00	0.00	0.00
1,000.0	0.00	0.00	1,000.0	0.0	0.0	0.0	0.00	0.00	0.00
1,100.0	0.00	0.00	1,100.0	0.0	0.0	0.0	0.00	0.00	0.00
1,200.0	0.00	0.00	1,200.0	0.0	0.0	0.0	0.00	0.00	0.00
1,300.0	0.00	0.00	1,300.0	0.0	0.0	0.0	0.00	0.00	0.00
1,400.0	0.00	0.00	1,400.0	0.0	0.0	0.0	0.00	0.00	0.00
1,500.0	0.00	0.00	1,500.0	0.0	0.0	0.0	0.00	0.00	0.00
1,600.0	0.00	0.00	1,600.0	0.0	0.0	0.0	0.00	0.00	0.00
1,700.0	0.00	0.00	1,700.0	0.0	0.0	0.0	0.00	0.00	0.00
1,800.0	0.00	0.00	1,800.0	0.0	0.0	0.0	0.00	0.00	0.00
1,900.0	0.00	0.00	1,900.0	0.0	0.0	0.0	0.00	0.00	0.00
2,000.0	0.00	0.00	2,000.0	0.0	0.0	0.0	0.00	0.00	0.00
2,047.4	0.95	99.17	2,047.4	-0.1	0.4	-0.1	2.00	2.00	0.00
2,100.0	0.95	99.17	2,100.0	-0.2	1.2	-0.2	0.00	0.00	0.00
2,200.0	0.95	99.17	2,200.0	-0.5	2.9	-0.5	0.00	0.00	0.00
2,300.0	0.95	99.17	2,300.0	-0.7	4.5	-0.7	0.00	0.00	0.00
2,400.0	0.95	99.17	2,399.9	-1.0	6.1	-1.0	0.00	0.00	0.00
2,500.0	0.95	99.17	2,499.9	-1.3	7.8	-1.3	0.00	0.00	0.00
2,600.0	0.95	99.17	2,599.9	-1.5	9.4	-1.6	0.00	0.00	0.00
2,700.0	0.95	99.17	2,699.9	-1.8	11.1	-1.8	0.00	0.00	0.00
2,800.0	0.95	99.17	2,799.9	-2.0	12.7	-2.1	0.00	0.00	0.00
2,900.0	0.95	99.17	2,899.9	-2.3	14.3	-2.4	0.00	0.00	0.00
3,000.0	0.95	99.17	2,999.9	-2.6	16.0	-2.6	0.00	0.00	0.00
3,100.0	0.95	99.17	3,099.9	-2.8	17.6	-2.9	0.00	0.00	0.00
3,200.0	0.95	99.17	3,199.8	-3.1	19.2	-3.2	0.00	0.00	0.00
3,300.0	0.95	99.17	3,299.8	-3.4	20.9	-3.4	0.00	0.00	0.00
3,400.0	0.95	99.17	3,399.8	-3.6	22.5	-3.7	0.00	0.00	0.00
3,500.0	0.95	99.17	3,499.8	-3.9	24.1	-4.0	0.00	0.00	0.00
3,600.0	0.95	99.17	3,599.8	-4.2	25.8	-4.2	0.00	0.00	0.00
3,700.0	0.95	99.17	3,699.8	-4.4	27.4	-4.5	0.00	0.00	0.00
3,800.0	0.95	99.17	3,799.8	-4.7	29.0	-4.8	0.00	0.00	0.00
3,900.0	0.95	99.17	3,899.7	-5.0	30.7	-5.0	0.00	0.00	0.00
4,000.0	0.95	99.17	3,999.7	-5.2	32.3	-5.3	0.00	0.00	0.00
4,100.0	0.95	99.17	4,099.7	-5.5	33.9	-5.6	0.00	0.00	0.00
4,200.0	0.95	99.17	4,199.7	-5.7	35.6	-5.9	0.00	0.00	0.00
4,300.0	0.95	99.17	4,299.7	-6.0	37.2	-6.1	0.00	0.00	0.00
4,400.0	0.95	99.17	4,399.7	-6.3	38.8	-6.4	0.00	0.00	0.00
4,500.0	0.95	99.17	4,499.7	-6.5	40.5	-6.7	0.00	0.00	0.00
4,600.0	0.95	99.17	4,599.6	-6.8	42.1	-6.9	0.00	0.00	0.00
4,700.0	0.95	99.17	4,699.6	-7.1	43.7	-7.2	0.00	0.00	0.00
4,800.0	0.95	99.17	4,799.6	-7.3	45.4	-7.5	0.00	0.00	0.00
4,900.0	0.95	99.17	4,899.6	-7.6	47.0	-7.7	0.00	0.00	0.00
5,000.0	0.95	99.17	4,999.6	-7.9	48.6	-8.0	0.00	0.00	0.00
5,100.0	0.95	99.17	5,099.6	-8.1	50.3	-8.3	0.00	0.00	0.00
5,200.0	0.95	99.17	5,199.6	-8.4	51.9	-8.5	0.00	0.00	0.00



Planning Report

Database: EDM 5000.14
 Company: EOG Resources - Midland
 Project: Lea County, NM (NAD 83 NME)
 Site: Neptune 10 State Com
 Well: #708H
 Wellbore: OH
 Design: Plan #0.1

Local Co-ordinate Reference: Well #708H
 TVD Reference: KB = 25' @ 3634.0usft
 MD Reference: KB = 25' @ 3634.0usft
 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)
5,300.0	0.95	99.17	5,299.6	-8.6	53.5	-8.8	0.00	0.00	0.00
5,400.0	0.95	99.17	5,399.5	-8.9	55.2	-9.1	0.00	0.00	0.00
5,500.0	0.95	99.17	5,499.5	-9.2	56.8	-9.4	0.00	0.00	0.00
5,600.0	0.95	99.17	5,599.5	-9.4	58.4	-9.6	0.00	0.00	0.00
5,700.0	0.95	99.17	5,699.5	-9.7	60.1	-9.9	0.00	0.00	0.00
5,800.0	0.95	99.17	5,799.5	-10.0	61.7	-10.2	0.00	0.00	0.00
5,900.0	0.95	99.17	5,899.5	-10.2	63.4	-10.4	0.00	0.00	0.00
6,000.0	0.95	99.17	5,999.5	-10.5	65.0	-10.7	0.00	0.00	0.00
6,100.0	0.95	99.17	6,099.4	-10.8	66.6	-11.0	0.00	0.00	0.00
6,200.0	0.95	99.17	6,199.4	-11.0	68.3	-11.2	0.00	0.00	0.00
6,300.0	0.95	99.17	6,299.4	-11.3	69.9	-11.5	0.00	0.00	0.00
6,400.0	0.95	99.17	6,399.4	-11.5	71.5	-11.8	0.00	0.00	0.00
6,500.0	0.95	99.17	6,499.4	-11.8	73.2	-12.0	0.00	0.00	0.00
6,600.0	0.95	99.17	6,599.4	-12.1	74.8	-12.3	0.00	0.00	0.00
6,700.0	0.95	99.17	6,699.4	-12.3	76.4	-12.6	0.00	0.00	0.00
6,800.0	0.95	99.17	6,799.3	-12.6	78.1	-12.9	0.00	0.00	0.00
6,900.0	0.95	99.17	6,899.3	-12.9	79.7	-13.1	0.00	0.00	0.00
7,000.0	0.95	99.17	6,999.3	-13.1	81.3	-13.4	0.00	0.00	0.00
7,100.0	0.95	99.17	7,099.3	-13.4	83.0	-13.7	0.00	0.00	0.00
7,200.0	0.95	99.17	7,199.3	-13.7	84.6	-13.9	0.00	0.00	0.00
7,300.0	0.95	99.17	7,299.3	-13.9	86.2	-14.2	0.00	0.00	0.00
7,400.0	0.95	99.17	7,399.3	-14.2	87.9	-14.5	0.00	0.00	0.00
7,500.0	0.95	99.17	7,499.3	-14.4	89.5	-14.7	0.00	0.00	0.00
7,600.0	0.95	99.17	7,599.2	-14.7	91.1	-15.0	0.00	0.00	0.00
7,700.0	0.95	99.17	7,699.2	-15.0	92.8	-15.3	0.00	0.00	0.00
7,800.0	0.95	99.17	7,799.2	-15.2	94.4	-15.5	0.00	0.00	0.00
7,900.0	0.95	99.17	7,899.2	-15.5	96.0	-15.8	0.00	0.00	0.00
8,000.0	0.95	99.17	7,999.2	-15.8	97.7	-16.1	0.00	0.00	0.00
8,100.0	0.95	99.17	8,099.2	-16.0	99.3	-16.4	0.00	0.00	0.00
8,200.0	0.95	99.17	8,199.2	-16.3	100.9	-16.6	0.00	0.00	0.00
8,300.0	0.95	99.17	8,299.1	-16.6	102.6	-16.9	0.00	0.00	0.00
8,400.0	0.95	99.17	8,399.1	-16.8	104.2	-17.2	0.00	0.00	0.00
8,500.0	0.95	99.17	8,499.1	-17.1	105.8	-17.4	0.00	0.00	0.00
8,600.0	0.95	99.17	8,599.1	-17.3	107.5	-17.7	0.00	0.00	0.00
8,700.0	0.95	99.17	8,699.1	-17.6	109.1	-18.0	0.00	0.00	0.00
8,800.0	0.95	99.17	8,799.1	-17.9	110.7	-18.2	0.00	0.00	0.00
8,900.0	0.95	99.17	8,899.1	-18.1	112.4	-18.5	0.00	0.00	0.00
9,000.0	0.95	99.17	8,999.0	-18.4	114.0	-18.8	0.00	0.00	0.00
9,100.0	0.95	99.17	9,099.0	-18.7	115.7	-19.0	0.00	0.00	0.00
9,200.0	0.95	99.17	9,199.0	-18.9	117.3	-19.3	0.00	0.00	0.00
9,300.0	0.95	99.17	9,299.0	-19.2	118.9	-19.6	0.00	0.00	0.00
9,400.0	0.95	99.17	9,399.0	-19.5	120.6	-19.9	0.00	0.00	0.00
9,500.0	0.95	99.17	9,499.0	-19.7	122.2	-20.1	0.00	0.00	0.00
9,600.0	0.95	99.17	9,599.0	-20.0	123.8	-20.4	0.00	0.00	0.00
9,700.0	0.95	99.17	9,698.9	-20.3	125.5	-20.7	0.00	0.00	0.00
9,800.0	0.95	99.17	9,798.9	-20.5	127.1	-20.9	0.00	0.00	0.00
9,900.0	0.95	99.17	9,898.9	-20.8	128.7	-21.2	0.00	0.00	0.00
10,000.0	0.95	99.17	9,998.9	-21.0	130.4	-21.5	0.00	0.00	0.00
10,100.0	0.95	99.17	10,098.9	-21.3	132.0	-21.7	0.00	0.00	0.00
10,200.0	0.95	99.17	10,198.9	-21.6	133.6	-22.0	0.00	0.00	0.00
10,300.0	0.95	99.17	10,298.9	-21.8	135.3	-22.3	0.00	0.00	0.00
10,400.0	0.95	99.17	10,398.9	-22.1	136.9	-22.5	0.00	0.00	0.00
10,500.0	0.95	99.17	10,498.8	-22.4	138.5	-22.8	0.00	0.00	0.00
10,600.0	0.95	99.17	10,598.8	-22.6	140.2	-23.1	0.00	0.00	0.00



Planning Report

Database: EDM 5000.14
Company: EOG Resources - Midland
Project: Lea County, NM (NAD 83 NME)
Site: Neptune 10 State Com
Well: #708H
Wellbore: OH
Design: Plan #0.1

Local Co-ordinate Reference:
TVD Reference:
MD Reference:
North Reference:
Survey Calculation Method:

Well #708H
KB = 25' @ 3634.0usft
KB = 25' @ 3634.0usft
Grid
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)
10,700.0	0.95	99.17	10,698.8	-22.9	141.8	-23.4	0.00	0.00	0.00
10,800.0	0.95	99.17	10,798.8	-23.2	143.4	-23.6	0.00	0.00	0.00
10,900.0	0.95	99.17	10,898.8	-23.4	145.1	-23.9	0.00	0.00	0.00
11,000.0	0.95	99.17	10,998.8	-23.7	146.7	-24.2	0.00	0.00	0.00
11,100.0	0.95	99.17	11,098.8	-23.9	148.3	-24.4	0.00	0.00	0.00
11,200.0	0.95	99.17	11,198.7	-24.2	150.0	-24.7	0.00	0.00	0.00
11,300.0	0.95	99.17	11,298.7	-24.5	151.6	-25.0	0.00	0.00	0.00
11,400.0	0.95	99.17	11,398.7	-24.7	153.2	-25.2	0.00	0.00	0.00
11,500.0	0.95	99.17	11,498.7	-25.0	154.9	-25.5	0.00	0.00	0.00
11,600.0	0.95	99.17	11,598.7	-25.3	156.5	-25.8	0.00	0.00	0.00
11,700.0	0.95	99.17	11,698.7	-25.5	158.1	-26.0	0.00	0.00	0.00
11,800.0	0.95	99.17	11,798.7	-25.8	159.8	-26.3	0.00	0.00	0.00
11,828.6	0.95	99.17	11,827.3	-25.9	160.2	-26.4	0.00	0.00	0.00
11,850.0	2.58	20.79	11,848.6	-25.4	160.6	-26.0	12.00	7.64	-366.65
11,875.0	5.49	9.35	11,873.6	-23.7	161.0	-24.3	12.00	11.62	-45.75
11,900.0	8.46	5.87	11,898.4	-20.7	161.4	-21.3	12.00	11.89	-13.93
11,925.0	11.44	4.20	11,923.0	-16.4	161.7	-17.0	12.00	11.95	-6.71
11,950.0	14.44	3.21	11,947.4	-10.8	162.1	-11.4	12.00	11.97	-3.96
11,975.0	17.43	2.55	11,971.4	-4.0	162.4	-4.5	12.00	11.98	-2.62
12,000.0	20.43	2.08	11,995.1	4.1	162.8	3.6	12.00	11.98	-1.87
12,025.0	23.42	1.73	12,018.3	13.4	163.1	12.9	12.00	11.99	-1.41
12,050.0	26.42	1.45	12,040.9	24.0	163.4	23.4	12.00	11.99	-1.11
12,075.0	29.42	1.23	12,063.0	35.7	163.6	35.1	12.00	11.99	-0.90
12,100.0	32.42	1.04	12,084.5	48.5	163.9	48.0	12.00	11.99	-0.74
12,125.0	35.42	0.89	12,105.2	62.5	164.1	61.9	12.00	11.99	-0.63
12,150.0	38.42	0.75	12,125.2	77.5	164.3	76.9	12.00	12.00	-0.54
12,175.0	41.42	0.63	12,144.4	93.5	164.5	93.0	12.00	12.00	-0.48
12,200.0	44.41	0.52	12,162.7	110.5	164.7	110.0	12.00	12.00	-0.42
12,225.0	47.41	0.43	12,180.1	128.5	164.8	128.0	12.00	12.00	-0.38
12,250.0	50.41	0.34	12,196.5	147.3	165.0	146.8	12.00	12.00	-0.35
12,275.0	53.41	0.26	12,211.9	167.0	165.1	166.5	12.00	12.00	-0.32
12,300.0	56.41	0.19	12,226.3	187.5	165.2	186.9	12.00	12.00	-0.29
12,325.0	59.41	0.12	12,239.5	208.6	165.2	208.1	12.00	12.00	-0.27
12,350.0	62.41	0.06	12,251.7	230.5	165.3	229.9	12.00	12.00	-0.26
12,375.0	65.41	360.00	12,262.7	252.9	165.3	252.4	12.00	12.00	-0.24
12,400.0	68.41	359.94	12,272.5	275.9	165.2	275.4	12.00	12.00	-0.23
12,425.0	71.41	359.88	12,281.1	299.4	165.2	298.9	12.00	12.00	-0.22
12,450.0	74.41	359.83	12,288.4	323.3	165.2	322.8	12.00	12.00	-0.21
12,475.0	77.41	359.78	12,294.5	347.5	165.1	347.0	12.00	12.00	-0.21
12,500.0	80.41	359.73	12,299.3	372.1	165.0	371.5	12.00	12.00	-0.20
12,525.0	83.41	359.68	12,302.8	396.8	164.8	396.3	12.00	12.00	-0.20
12,550.0	86.41	359.63	12,305.1	421.7	164.7	421.2	12.00	12.00	-0.20
12,575.0	89.41	359.58	12,306.0	446.7	164.5	446.2	12.00	12.00	-0.20
12,579.9	90.00	359.57	12,306.0	451.6	164.5	451.1	12.00	12.00	-0.20
12,600.0	90.00	359.57	12,306.0	471.7	164.3	471.2	0.00	0.00	0.00
12,700.0	90.00	359.57	12,306.0	571.7	163.6	571.2	0.00	0.00	0.00
12,800.0	90.00	359.57	12,306.0	671.7	162.8	671.2	0.00	0.00	0.00
12,900.0	90.00	359.57	12,306.0	771.7	162.1	771.2	0.00	0.00	0.00
13,000.0	90.00	359.57	12,306.0	871.7	161.3	871.2	0.00	0.00	0.00
13,100.0	90.00	359.57	12,306.0	971.7	160.6	971.2	0.00	0.00	0.00
13,200.0	90.00	359.57	12,306.0	1,071.7	159.8	1,071.2	0.00	0.00	0.00
13,300.0	90.00	359.57	12,306.0	1,171.7	159.1	1,171.2	0.00	0.00	0.00
13,400.0	90.00	359.57	12,306.0	1,271.7	158.3	1,271.2	0.00	0.00	0.00
13,500.0	90.00	359.57	12,306.0	1,371.7	157.6	1,371.2	0.00	0.00	0.00



Planning Report

Database: EDM 5000.14
Company: EOG Resources - Midland
Project: Lea County, NM (NAD 83 NME)
Site: Neptune 10 State Com
Well: #708H
Wellbore: OH
Design: Plan #0.1

Local Co-ordinate Reference:
TVD Reference:
MD Reference:
North Reference:
Survey Calculation Method:

Well #708H
KB = 25' @ 3634.0usft
KB = 25' @ 3634.0usft
Grid
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)
13,600.0	90.00	359.57	12,306.0	1,471.7	156.8	1,471.2	0.00	0.00	0.00
13,700.0	90.00	359.57	12,306.0	1,571.7	156.1	1,571.2	0.00	0.00	0.00
13,800.0	90.00	359.57	12,306.0	1,671.7	155.3	1,671.2	0.00	0.00	0.00
13,900.0	90.00	359.57	12,306.0	1,771.7	154.6	1,771.1	0.00	0.00	0.00
14,000.0	90.00	359.57	12,306.0	1,871.7	153.8	1,871.1	0.00	0.00	0.00
14,100.0	90.00	359.57	12,306.0	1,971.7	153.1	1,971.1	0.00	0.00	0.00
14,200.0	90.00	359.57	12,306.0	2,071.7	152.3	2,071.1	0.00	0.00	0.00
14,300.0	90.00	359.57	12,306.0	2,171.7	151.6	2,171.1	0.00	0.00	0.00
14,400.0	90.00	359.57	12,306.0	2,271.6	150.8	2,271.1	0.00	0.00	0.00
14,500.0	90.00	359.57	12,306.0	2,371.6	150.1	2,371.1	0.00	0.00	0.00
14,600.0	90.00	359.57	12,306.0	2,471.6	149.3	2,471.1	0.00	0.00	0.00
14,700.0	90.00	359.57	12,306.0	2,571.6	148.6	2,571.1	0.00	0.00	0.00
14,800.0	90.00	359.57	12,306.0	2,671.6	147.8	2,671.1	0.00	0.00	0.00
14,900.0	90.00	359.57	12,306.0	2,771.6	147.1	2,771.1	0.00	0.00	0.00
15,000.0	90.00	359.57	12,306.0	2,871.6	146.3	2,871.1	0.00	0.00	0.00
15,100.0	90.00	359.57	12,306.0	2,971.6	145.6	2,971.1	0.00	0.00	0.00
15,200.0	90.00	359.57	12,306.0	3,071.6	144.8	3,071.1	0.00	0.00	0.00
15,300.0	90.00	359.57	12,306.0	3,171.6	144.1	3,171.1	0.00	0.00	0.00
15,400.0	90.00	359.57	12,306.0	3,271.6	143.3	3,271.1	0.00	0.00	0.00
15,500.0	90.00	359.57	12,306.0	3,371.6	142.6	3,371.1	0.00	0.00	0.00
15,600.0	90.00	359.57	12,306.0	3,471.6	141.8	3,471.1	0.00	0.00	0.00
15,700.0	90.00	359.57	12,306.0	3,571.6	141.1	3,571.1	0.00	0.00	0.00
15,800.0	90.00	359.57	12,306.0	3,671.6	140.3	3,671.1	0.00	0.00	0.00
15,900.0	90.00	359.57	12,306.0	3,771.6	139.6	3,771.1	0.00	0.00	0.00
16,000.0	90.00	359.57	12,306.0	3,871.6	138.8	3,871.1	0.00	0.00	0.00
16,100.0	90.00	359.57	12,306.0	3,971.6	138.1	3,971.1	0.00	0.00	0.00
16,200.0	90.00	359.57	12,306.0	4,071.6	137.3	4,071.1	0.00	0.00	0.00
16,300.0	90.00	359.57	12,306.0	4,171.6	136.6	4,171.1	0.00	0.00	0.00
16,400.0	90.00	359.57	12,306.0	4,271.6	135.8	4,271.1	0.00	0.00	0.00
16,500.0	90.00	359.57	12,306.0	4,371.6	135.1	4,371.1	0.00	0.00	0.00
16,600.0	90.00	359.57	12,306.0	4,471.6	134.3	4,471.1	0.00	0.00	0.00
16,700.0	90.00	359.57	12,306.0	4,571.6	133.6	4,571.1	0.00	0.00	0.00
16,800.0	90.00	359.57	12,306.0	4,671.6	132.8	4,671.1	0.00	0.00	0.00
16,900.0	90.00	359.57	12,306.0	4,771.6	132.1	4,771.1	0.00	0.00	0.00
17,000.0	90.00	359.57	12,306.0	4,871.6	131.3	4,871.1	0.00	0.00	0.00
17,100.0	90.00	359.57	12,306.0	4,971.6	130.6	4,971.1	0.00	0.00	0.00
17,200.0	90.00	359.57	12,306.0	5,071.6	129.8	5,071.1	0.00	0.00	0.00
17,300.0	90.00	359.57	12,306.0	5,171.6	129.1	5,171.1	0.00	0.00	0.00
17,400.0	90.00	359.57	12,306.0	5,271.6	128.3	5,271.1	0.00	0.00	0.00
17,500.0	90.00	359.57	12,306.0	5,371.6	127.6	5,371.1	0.00	0.00	0.00
17,600.0	90.00	359.57	12,306.0	5,471.6	126.8	5,471.1	0.00	0.00	0.00
17,700.0	90.00	359.57	12,306.0	5,571.6	126.1	5,571.1	0.00	0.00	0.00
17,800.0	90.00	359.57	12,306.0	5,671.6	125.3	5,671.1	0.00	0.00	0.00
17,900.0	90.00	359.57	12,306.0	5,771.5	124.6	5,771.1	0.00	0.00	0.00
18,000.0	90.00	359.57	12,306.0	5,871.5	123.8	5,871.1	0.00	0.00	0.00
18,100.0	90.00	359.57	12,306.0	5,971.5	123.1	5,971.1	0.00	0.00	0.00
18,200.0	90.00	359.57	12,306.0	6,071.5	122.3	6,071.1	0.00	0.00	0.00
18,300.0	90.00	359.57	12,306.0	6,171.5	121.5	6,171.1	0.00	0.00	0.00
18,400.0	90.00	359.57	12,306.0	6,271.5	120.8	6,271.1	0.00	0.00	0.00
18,500.0	90.00	359.57	12,306.0	6,371.5	120.0	6,371.1	0.00	0.00	0.00
18,600.0	90.00	359.57	12,306.0	6,471.5	119.3	6,471.1	0.00	0.00	0.00
18,700.0	90.00	359.57	12,306.0	6,571.5	118.5	6,571.1	0.00	0.00	0.00
18,800.0	90.00	359.57	12,306.0	6,671.5	117.8	6,671.1	0.00	0.00	0.00
18,900.0	90.00	359.57	12,306.0	6,771.5	117.0	6,771.1	0.00	0.00	0.00



Planning Report

Database: EDM 5000.14
 Company: EOG Resources - Midland
 Project: Lea County, NM (NAD 83 NME)
 Site: Neptune 10 State Com
 Well: #708H
 Wellbore: OH
 Design: Plan #0.1

Local Co-ordinate Reference: Well #708H
 TVD Reference: KB = 25' @ 3634.0usft
 MD Reference: KB = 25' @ 3634.0usft
 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)
19,000.0	90.00	359.57	12,306.0	6,871.5	116.3	6,871.1	0.00	0.00	0.00
19,100.0	90.00	359.57	12,306.0	6,971.5	115.5	6,971.1	0.00	0.00	0.00
19,200.0	90.00	359.57	12,306.0	7,071.5	114.8	7,071.1	0.00	0.00	0.00
19,300.0	90.00	359.57	12,306.0	7,171.5	114.0	7,171.1	0.00	0.00	0.00
19,400.0	90.00	359.57	12,306.0	7,271.5	113.3	7,271.1	0.00	0.00	0.00
19,500.0	90.00	359.57	12,306.0	7,371.5	112.5	7,371.1	0.00	0.00	0.00
19,600.0	90.00	359.57	12,306.0	7,471.5	111.8	7,471.1	0.00	0.00	0.00
19,700.0	90.00	359.57	12,306.0	7,571.5	111.0	7,571.1	0.00	0.00	0.00
19,800.0	90.00	359.57	12,306.0	7,671.5	110.3	7,671.1	0.00	0.00	0.00
19,900.0	90.00	359.57	12,306.0	7,771.5	109.5	7,771.1	0.00	0.00	0.00
20,000.0	90.00	359.57	12,306.0	7,871.5	108.8	7,871.1	0.00	0.00	0.00
20,100.0	90.00	359.57	12,306.0	7,971.5	108.0	7,971.1	0.00	0.00	0.00
20,200.0	90.00	359.57	12,306.0	8,071.5	107.3	8,071.1	0.00	0.00	0.00
20,300.0	90.00	359.57	12,306.0	8,171.5	106.5	8,171.1	0.00	0.00	0.00
20,400.0	90.00	359.57	12,306.0	8,271.5	105.8	8,271.1	0.00	0.00	0.00
20,500.0	90.00	359.57	12,306.0	8,371.5	105.0	8,371.1	0.00	0.00	0.00
20,600.0	90.00	359.57	12,306.0	8,471.5	104.3	8,471.1	0.00	0.00	0.00
20,700.0	90.00	359.57	12,306.0	8,571.5	103.5	8,571.1	0.00	0.00	0.00
20,800.0	90.00	359.57	12,306.0	8,671.5	102.8	8,671.1	0.00	0.00	0.00
20,900.0	90.00	359.57	12,306.0	8,771.5	102.0	8,771.1	0.00	0.00	0.00
21,000.0	90.00	359.57	12,306.0	8,871.5	101.3	8,871.1	0.00	0.00	0.00
21,100.0	90.00	359.57	12,306.0	8,971.5	100.5	8,971.1	0.00	0.00	0.00
21,128.5	90.00	359.57	12,306.0	9,000.0	100.3	8,999.6	0.00	0.00	0.00
21,200.0	90.00	358.14	12,306.0	9,071.4	98.9	9,071.1	2.00	0.00	-2.00
21,300.0	90.00	356.14	12,306.0	9,171.3	93.9	9,171.0	2.00	0.00	-2.00
21,400.0	90.00	354.14	12,306.0	9,270.9	85.4	9,270.6	2.00	0.00	-2.00
21,457.0	90.00	353.00	12,306.0	9,327.6	79.0	9,327.3	2.00	0.00	-2.00
21,500.0	90.00	353.00	12,306.0	9,370.3	73.8	9,370.0	0.00	0.00	0.00
21,600.0	90.00	353.00	12,306.0	9,469.5	61.6	9,469.3	0.00	0.00	0.00
21,700.0	90.00	353.00	12,306.0	9,568.8	49.4	9,568.6	0.00	0.00	0.00
21,800.0	90.00	353.00	12,306.0	9,668.0	37.3	9,667.9	0.00	0.00	0.00
21,900.0	90.00	353.00	12,306.0	9,767.3	25.1	9,767.2	0.00	0.00	0.00
22,000.0	90.00	353.00	12,306.0	9,866.5	12.9	9,866.4	0.00	0.00	0.00
22,100.0	90.00	353.00	12,306.0	9,965.8	0.7	9,965.7	0.00	0.00	0.00
22,200.0	90.00	353.00	12,306.0	10,065.1	-11.5	10,065.0	0.00	0.00	0.00
22,300.0	90.00	353.00	12,306.0	10,164.3	-23.7	10,164.3	0.00	0.00	0.00
22,379.0	90.00	353.00	12,306.0	10,242.7	-33.3	10,242.8	0.00	0.00	0.00

Design Targets

Target Name	Dip Angle (°)	Dip Dir. (°)	TVD (usft)	+N/-S (usft)	+E/-W (usft)	Northing (usft)	Easting (usft)	Latitude	Longitude
FTP (Neptune 10 St Cor - hit/miss target - Shape - Point	0.00	0.00	12,306.0	244.0	166.0	446,735.00	781,045.00	32° 13' 32.785 N	103° 33' 29.370 W
- plan misses target center by 43.2usft at 12383.8usft MD (12266.3 TVD, 260.9 N, 165.3 E)									
PBHL (Neptune 10 St Cor - hit/miss target - Shape - Point	0.00	0.00	12,306.0	10,242.0	91.0	456,733.00	780,970.00	32° 15' 11.722 N	103° 33' 29.403 W
- plan misses target center by 123.3usft at 22363.1usft MD (12306.0 TVD, 10227.0 N, -31.4 E)									