



30-015-39060

Cog Operating LLC- Eastern NM

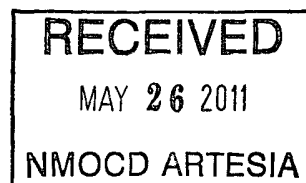
Eddy County

Myox 28 State Com

#2H

OH

Plan: Plan 1



Pathfinder X&Y Report

17 May, 2011

PATHFINDER
A Schlumberger Company



Pathfinder
Pathfinder X&Y Report

PATHFINDER
A Schlumberger Company

Company:	Cog Operating LLC- Eastern NM	Local Co-ordinate Reference:	Well #2H
Project:	Eddy County	TVD Reference:	KB = 17' @ 2979.80usft (Original Well Elev)
Site:	Myox 28 State Com	MD Reference:	KB = 17' @ 2979.80usft (Original Well Elev)
Well:	#2H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	Plan 1	Database:	EDM 5000.1 Single User Db

Project	Eddy County		
Map System:	US State Plane 1927 (Exact solution)	System Datum:	Mean Sea Level
Geo Datum:	NAD 1927 (NADCON CONUS)		
Map Zone:	New Mexico East 3001		

Site		Myox 28 State Com									
Site Position:		Northing:		398,144.800 usft		Latitude:		32° 5' 39.809 N			
From:		Map		Easting:		573,854.100 usft		Longitude:		104° 5' 41.445 W	
Position Uncertainty:		0.00 usft		Slot Radius:		13-3/16 "		Grid Convergence:		0.13 °	

Well		#2H				
Well Position	+N/-S	0.00 usft	Northing:	398,090.880 usft	Latitude:	32° 5' 38.168 N
	+E/-W	0.00 usft	Easting:	613,719.880 usft	Longitude:	103° 57' 58.014 W
Position Uncertainty	0.00 usft		Wellhead Elevation:	usft	Ground Level:	2,962.80 usft

Wellbore	OH				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF200510	5/17/2011	7.76	60.02	48,542

Design		Plan 1		
Audit Notes:				
Version:		Phase:	PROTOTYPE	Tie On Depth: 0.00
Vertical Section:		Depth From (TVD)	+N/-S	+E/-W
		(usft)	(usft)	(usft)
		0.00	0.00	0.00
				Direction
				(°)
				0.14

Survey Tool Program		Date	5/17/2011		
From (usft)	To (usft)	Survey (Wellbore)	Tool Name	Description	
0.00	11,243.32	Plan 1 (OH)	MWD	MWD - Standard	



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MD (usft)	Inc (°)	Azi (azimuth) (°)	TVD (usft)	TVDSS (usft)	N/S (usft)	E/W (usft)	V. Sec (usft)	DLeg (°/100usft)	Northing (usft)	Easting (usft)
0.00	0.00	0.00	0.00	-2,979.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
100.00	0.00	0.00	100.00	-2,879.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
200.00	0.00	0.00	200.00	-2,779.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
300.00	0.00	0.00	300.00	-2,679.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
400.00	0.00	0.00	400.00	-2,579.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
500.00	0.00	0.00	500.00	-2,479.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
600.00	0.00	0.00	600.00	-2,379.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
700.00	0.00	0.00	700.00	-2,279.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
800.00	0.00	0.00	800.00	-2,179.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
900.00	0.00	0.00	900.00	-2,079.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
1,000.00	0.00	0.00	1,000.00	-1,979.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
1,100.00	0.00	0.00	1,100.00	-1,879.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
1,200.00	0.00	0.00	1,200.00	-1,779.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
1,300.00	0.00	0.00	1,300.00	-1,679.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
1,400.00	0.00	0.00	1,400.00	-1,579.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
1,500.00	0.00	0.00	1,500.00	-1,479.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
1,600.00	0.00	0.00	1,600.00	-1,379.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
1,700.00	0.00	0.00	1,700.00	-1,279.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
1,800.00	0.00	0.00	1,800.00	-1,179.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
1,900.00	0.00	0.00	1,900.00	-1,079.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
2,000.00	0.00	0.00	2,000.00	-979.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
2,100.00	0.00	0.00	2,100.00	-879.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
2,200.00	0.00	0.00	2,200.00	-779.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
2,300.00	0.00	0.00	2,300.00	-679.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
2,400.00	0.00	0.00	2,400.00	-579.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
2,500.00	0.00	0.00	2,500.00	-479.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
2,600.00	0.00	0.00	2,600.00	-379.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88



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2,700.00	0.00	0.00	2,700.00	-279.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
2,800.00	0.00	0.00	2,800.00	-179.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
2,900.00	0.00	0.00	2,900.00	-79.80	0.00	0.00	0.00	0.00	398,090.88	613,719.88
3,000.00	0.00	0.00	3,000.00	20.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
3,100.00	0.00	0.00	3,100.00	120.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
3,200.00	0.00	0.00	3,200.00	220.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
3,300.00	0.00	0.00	3,300.00	320.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
3,400.00	0.00	0.00	3,400.00	420.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
3,500.00	0.00	0.00	3,500.00	520.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
3,600.00	0.00	0.00	3,600.00	620.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
3,700.00	0.00	0.00	3,700.00	720.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
3,800.00	0.00	0.00	3,800.00	820.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
3,900.00	0.00	0.00	3,900.00	920.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
4,000.00	0.00	0.00	4,000.00	1,020.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
4,100.00	0.00	0.00	4,100.00	1,120.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
4,200.00	0.00	0.00	4,200.00	1,220.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
4,300.00	0.00	0.00	4,300.00	1,320.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
4,400.00	0.00	0.00	4,400.00	1,420.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
4,500.00	0.00	0.00	4,500.00	1,520.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
4,600.00	0.00	0.00	4,600.00	1,620.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
4,700.00	0.00	0.00	4,700.00	1,720.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
4,800.00	0.00	0.00	4,800.00	1,820.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
4,900.00	0.00	0.00	4,900.00	1,920.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
5,000.00	0.00	0.00	5,000.00	2,020.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
5,100.00	0.00	0.00	5,100.00	2,120.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
5,200.00	0.00	0.00	5,200.00	2,220.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
5,300.00	0.00	0.00	5,300.00	2,320.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88



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5,400.00	0.00	0.00	5,400.00	2,420.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
5,500.00	0.00	0.00	5,500.00	2,520.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
5,600.00	0.00	0.00	5,600.00	2,620.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
5,700.00	0.00	0.00	5,700.00	2,720.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
5,800.00	0.00	0.00	5,800.00	2,820.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
5,900.00	0.00	0.00	5,900.00	2,920.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
6,000.00	0.00	0.00	6,000.00	3,020.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
6,100.00	0.00	0.00	6,100.00	3,120.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
6,200.00	0.00	0.00	6,200.00	3,220.20	0.00	0.00	0.00	0.00	398,090.88	613,719.88
6,241.54	0.00	0.00	6,241.54	3,261.74	0.00	0.00	0.00	0.00	398,090.88	613,719.88
6,250.00	1.02	0.14	6,250.00	3,270.20	0.07	0.00	0.07	12.00	398,090.95	613,719.88
6,275.00	4.02	0.14	6,274.97	3,295.17	1.17	0.00	1.17	12.00	398,092.05	613,719.88
6,300.00	7.02	0.14	6,299.85	3,320.05	3.57	0.01	3.57	12.00	398,094.45	613,719.89
6,325.00	10.02	0.14	6,324.58	3,344.78	7.28	0.02	7.28	12.00	398,098.16	613,719.90
6,350.00	13.02	0.14	6,349.07	3,369.27	12.27	0.03	12.27	12.00	398,103.15	613,719.91
6,375.00	16.02	0.14	6,373.27	3,393.47	18.53	0.05	18.53	12.00	398,109.41	613,719.93
6,400.00	19.02	0.14	6,397.11	3,417.31	26.05	0.06	26.05	12.00	398,116.93	613,719.94
6,425.00	22.02	0.14	6,420.52	3,440.72	34.81	0.09	34.81	12.00	398,125.69	613,719.97
6,450.00	25.02	0.14	6,443.44	3,463.64	44.79	0.11	44.79	12.00	398,135.67	613,719.99
6,475.00	28.02	0.14	6,465.81	3,486.01	55.95	0.14	55.95	12.00	398,146.83	613,720.02
6,500.00	31.02	0.14	6,487.56	3,507.76	68.26	0.17	68.26	12.00	398,159.14	613,720.05
6,525.00	34.02	0.14	6,508.64	3,528.84	81.70	0.20	81.70	12.00	398,172.58	613,720.08
6,550.00	37.02	0.14	6,528.99	3,549.19	96.22	0.24	96.22	12.00	398,187.10	613,720.12
6,575.00	40.02	0.14	6,548.55	3,568.75	111.79	0.27	111.79	12.00	398,202.67	613,720.15
6,600.00	43.02	0.14	6,567.26	3,587.46	128.36	0.31	128.36	12.00	398,219.24	613,720.19
6,625.00	46.02	0.14	6,585.09	3,605.29	145.88	0.36	145.88	12.00	398,236.76	613,720.24
6,650.00	49.02	0.14	6,601.97	3,622.17	164.31	0.40	164.32	12.00	398,255.19	613,720.28



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6,675.00	52.02	0.14	6,617.87	3,638.07	183.61	0.45	183.61	12.00	398,274.49	613,720.33
6,700.00	55.02	0.14	6,632.73	3,652.93	203.71	0.50	203.71	12.00	398,294.59	613,720.38
6,725.00	58.02	0.14	6,646.52	3,666.72	224.55	0.55	224.55	12.00	398,315.43	613,720.43
6,750.00	61.02	0.14	6,659.20	3,679.40	246.10	0.60	246.10	12.00	398,336.98	613,720.48
6,775.00	64.02	0.14	6,670.74	3,690.94	268.27	0.66	268.27	12.00	398,359.15	613,720.54
6,800.00	67.02	0.14	6,681.10	3,701.30	291.02	0.71	291.02	12.00	398,381.90	613,720.59
6,825.00	70.02	0.14	6,690.25	3,710.45	314.28	0.77	314.28	12.00	398,405.16	613,720.65
6,850.00	73.02	0.14	6,698.18	3,718.38	337.99	0.83	337.99	12.00	398,428.87	613,720.71
6,875.00	76.02	0.14	6,704.85	3,725.05	362.08	0.89	362.08	12.00	398,452.96	613,720.77
6,900.00	79.02	0.14	6,710.26	3,730.46	386.48	0.95	386.48	12.00	398,477.36	613,720.83
6,925.00	82.02	0.14	6,714.38	3,734.58	411.14	1.01	411.14	12.00	398,502.02	613,720.89
6,950.00	85.02	0.14	6,717.20	3,737.40	435.98	1.07	435.98	12.00	398,526.86	613,720.95
6,975.00	88.02	0.14	6,718.72	3,738.92	460.93	1.13	460.93	12.00	398,551.81	613,721.01
6,991.54	90.00	0.14	6,719.00	3,739.20	477.46	1.17	477.47	12.00	398,568.34	613,721.05
7,000.00	90.00	0.14	6,719.00	3,739.20	485.92	1.19	485.92	0.00	398,576.80	613,721.07
7,100.00	90.00	0.14	6,719.00	3,739.20	585.92	1.43	585.92	0.00	398,676.80	613,721.31
7,200.00	90.00	0.14	6,719.00	3,739.20	685.92	1.68	685.92	0.00	398,776.80	613,721.56
7,300.00	90.00	0.14	6,719.00	3,739.20	785.92	1.92	785.92	0.00	398,876.80	613,721.80
7,400.00	90.00	0.14	6,719.00	3,739.20	885.92	2.17	885.92	0.00	398,976.80	613,722.05
7,500.00	90.00	0.14	6,719.00	3,739.20	985.92	2.41	985.92	0.00	399,076.80	613,722.29
7,600.00	90.00	0.14	6,719.00	3,739.20	1,085.92	2.66	1,085.92	0.00	399,176.80	613,722.54
7,700.00	90.00	0.14	6,719.00	3,739.20	1,185.92	2.90	1,185.92	0.00	399,276.80	613,722.78
7,800.00	90.00	0.14	6,719.00	3,739.20	1,285.92	3.15	1,285.92	0.00	399,376.80	613,723.03
7,900.00	90.00	0.14	6,719.00	3,739.20	1,385.92	3.39	1,385.92	0.00	399,476.80	613,723.27
8,000.00	90.00	0.14	6,719.00	3,739.20	1,485.92	3.64	1,485.92	0.00	399,576.80	613,723.52
8,100.00	90.00	0.14	6,719.00	3,739.20	1,585.92	3.88	1,585.92	0.00	399,676.80	613,723.76
8,200.00	90.00	0.14	6,719.00	3,739.20	1,685.92	4.13	1,685.92	0.00	399,776.80	613,724.01



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Planned Survey

MD (usft)	Inc (%)	Azi (azimuth) (°)	TVD (usft)	TVDSS (usft)	N/S (usft)	E/W (usft)	V. Sec (usft)	DLeg (°/100usft)	Northing (usft)	Easting (usft)
8,300.00	90.00	0.14	6,719.00	3,739.20	1,785.92	4.37	1,785.92	0.00	399,876.80	613,724.25
8,400.00	90.00	0.14	6,719.00	3,739.20	1,885.92	4.62	1,885.92	0.00	399,976.80	613,724.50
8,500.00	90.00	0.14	6,719.00	3,739.20	1,985.92	4.86	1,985.92	0.00	400,076.80	613,724.74
8,600.00	90.00	0.14	6,719.00	3,739.20	2,085.92	5.11	2,085.92	0.00	400,176.80	613,724.99
8,700.00	90.00	0.14	6,719.00	3,739.20	2,185.92	5.35	2,185.92	0.00	400,276.80	613,725.23
8,800.00	90.00	0.14	6,719.00	3,739.20	2,285.92	5.60	2,285.92	0.00	400,376.80	613,725.48
8,900.00	90.00	0.14	6,719.00	3,739.20	2,385.92	5.84	2,385.92	0.00	400,476.80	613,725.72
9,000.00	90.00	0.14	6,719.00	3,739.20	2,485.92	6.09	2,485.92	0.00	400,576.80	613,725.97
9,100.00	90.00	0.14	6,719.00	3,739.20	2,585.92	6.33	2,585.92	0.00	400,676.80	613,726.21
9,200.00	90.00	0.14	6,719.00	3,739.20	2,685.92	6.58	2,685.92	0.00	400,776.80	613,726.46
9,300.00	90.00	0.14	6,719.00	3,739.20	2,785.92	6.82	2,785.92	0.00	400,876.80	613,726.70
9,400.00	90.00	0.14	6,719.00	3,739.20	2,885.92	7.07	2,885.92	0.00	400,976.80	613,726.95
9,500.00	90.00	0.14	6,719.00	3,739.20	2,985.92	7.31	2,985.92	0.00	401,076.80	613,727.19
9,600.00	90.00	0.14	6,719.00	3,739.20	3,085.92	7.56	3,085.92	0.00	401,176.80	613,727.44
9,700.00	90.00	0.14	6,719.00	3,739.20	3,185.92	7.80	3,185.92	0.00	401,276.80	613,727.68
9,800.00	90.00	0.14	6,719.00	3,739.20	3,285.91	8.05	3,285.92	0.00	401,376.79	613,727.93
9,900.00	90.00	0.14	6,719.00	3,739.20	3,385.91	8.29	3,385.92	0.00	401,476.79	613,728.17
10,000.00	90.00	0.14	6,719.00	3,739.20	3,485.91	8.54	3,485.92	0.00	401,576.79	613,728.42
10,100.00	90.00	0.14	6,719.00	3,739.20	3,585.91	8.78	3,585.92	0.00	401,676.79	613,728.66
10,200.00	90.00	0.14	6,719.00	3,739.20	3,685.91	9.03	3,685.92	0.00	401,776.79	613,728.91
10,300.00	90.00	0.14	6,719.00	3,739.20	3,785.91	9.27	3,785.92	0.00	401,876.79	613,729.15
10,400.00	90.00	0.14	6,719.00	3,739.20	3,885.91	9.52	3,885.92	0.00	401,976.79	613,729.40
10,500.00	90.00	0.14	6,719.00	3,739.20	3,985.91	9.76	3,985.92	0.00	402,076.79	613,729.64
10,600.00	90.00	0.14	6,719.00	3,739.20	4,085.91	10.00	4,085.92	0.00	402,176.79	613,729.88
10,700.00	90.00	0.14	6,719.00	3,739.20	4,185.91	10.25	4,185.92	0.00	402,276.79	613,730.13
10,800.00	90.00	0.14	6,719.00	3,739.20	4,285.91	10.49	4,285.92	0.00	402,376.79	613,730.37
10,900.00	90.00	0.14	6,719.00	3,739.20	4,385.91	10.74	4,385.92	0.00	402,476.79	613,730.62



Pathfinder
Pathfinder X&Y Report

PATHFINDER
A Schlumberger Company

Company: Cog Operating LLC- Eastern NM
Project: Eddy County
Site: Myox 28 State Com
Well: #2H
Wellbore: OH
Design: Plan 1

Local Co-ordinate Reference: Well #2H
TVD Reference: KB = 17' @ 2979.80usft (Original Well Elev)
MD Reference: KB = 17' @ 2979.80usft (Original Well Elev)
North Reference: Grid
Survey Calculation Method: Minimum Curvature
Database: EDM 5000.1 Single User Db

Planned Survey

MD (usft)	Inc (°)	Azi (azimuth) (°)	TVD (usft)	TVDSS (usft)	N/S (usft)	E/W (usft)	V. Sec (usft)	DLeg (°/100usft)	Northing (usft)	Easting (usft)
11,000.00	90.00	0.14	6,719.00	3,739.20	4,485.91	10.98	4,485.92	0.00	402,576.79	613,730.86
11,100.00	90.00	0.14	6,719.00	3,739.20	4,585.91	11.23	4,585.92	0.00	402,676.79	613,731.11
11,200.00	90.00	0.14	6,719.00	3,739.20	4,685.91	11.47	4,685.92	0.00	402,776.79	613,731.35
11,243.34	90.00	0.14	6,719.00	3,739.20	4,729.25	11.58	4,729.26	0.00	402,820.13	613,731.46

Checked By: _____ Approved By: _____ Date: _____



Project: Eddy County
Site: Myox 28 State Com
Well: #2H
Wellbore: OH
Plan: Plan 1 (#2H/OH)

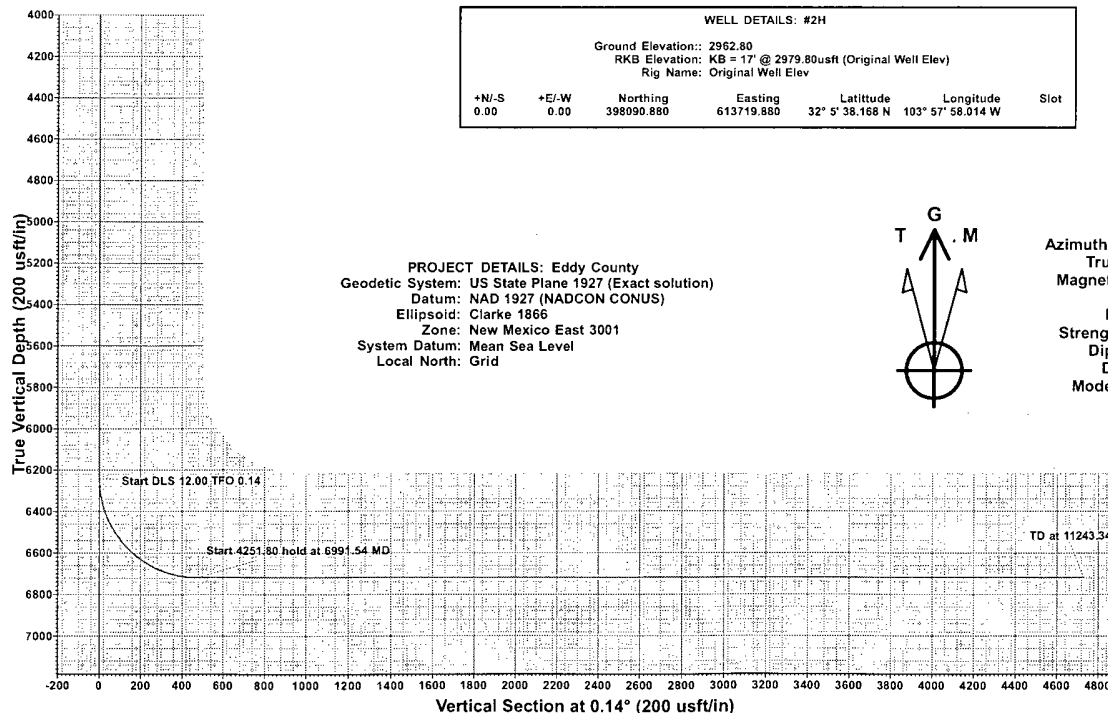
PATHFINDER

A Schlumberger Company

SECTION DETAILS									
MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	VSec	Target
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
6241.54	0.00	0.00	6241.54	0.00	0.00	0.00	0.00	0.00	
6991.54	90.00	0.14	6719.00	477.46	1.17	12.00	0.14	477.47	
11243.34	90.00	0.14	6719.00	4729.25	11.58	0.00	0.00	4729.26	BHL (MYOX 28 #2H)

WELLBORE TARGET DETAILS (MAP CO-ORDINATES)						
Name	TVD	+N/-S	+E/-W	Northing	Easting	Shape
BHL (MYOX 28 #2H)	6719.00	4729.25	11.58	402820.130	613731.460	Point

WELL DETAILS: #2H						
Ground Elevation:: 2962.80						
RKB Elevation: KB = 17' @ 2979.80usft (Original Well Elev)						
Rig Name: Original Well Elev						
+N/-S	+E/-W	Northing	Easting	Latitude	Longitude	Slot
0.00	0.00	398090.880	613719.880	32° 5' 38.168 N	103° 57' 58.014 W	

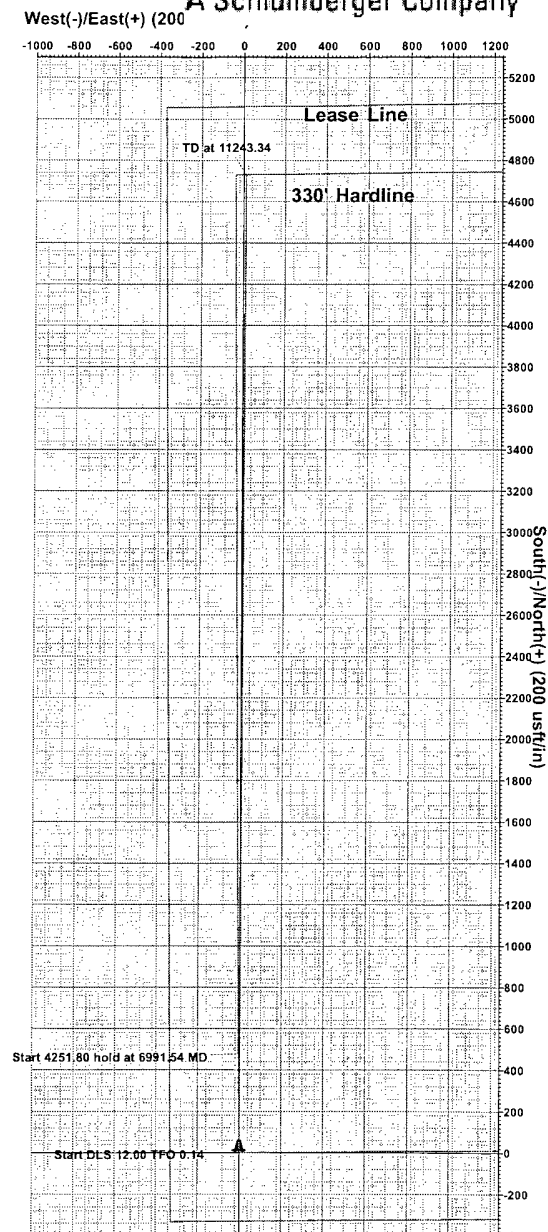


PROJECT DETAILS: Eddy County
Geodetic System: US State Plane 1927 (Exact solution)
Datum: NAD 1927 (NADCON CONUS)
Ellipsoid: Clarke 1866
Zone: New Mexico East 3001
System Datum: Mean Sea Level
Local North: Grid



Azimuths to Grid North
True North: -0.20°
Magnetic North: 7.56°

Magnetic Field
Strength: 48542.1snT
Dip Angle: 60.02°
Date: 5/17/2011
Model: IGRF200510



Plan: Plan 1 (#2H/OH)
Created By: Sherman Sholars Date: 15:39, May 17 2011
Checked: _____ Date: _____

Plan 1.txt

H HEADER INFORMATION

H COMPANY : Cog Operating LLC- Eastern NM
H FIELD : Eddy County
H SITE : Myox 28 State Com
H WELL : #2H
H WELLPATH: OH
H DEPTHUNT: usft
H SURVDATE: 1/1/1990

H WELL INFORMATION

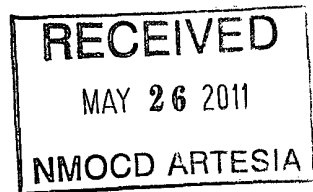
H WELL EW MAP : 613719.88
H WELL NS MAP : 398090.88
H DATUM ELEVN : 2979.80
H VSECT ANGLE : 0.14
H VSECT NORTH : 0.00
H VSECT EAST : 0.00

H SURVEY TYPE INFORMATION

H 0.00 - 11243.32 PLAN 1 : MWD

H SURVEY LIST

H MD	INC	AZI	TVD	NS	EW
0.00	0.00	0.00	0.00	0.00	0.00
100.00	0.00	0.00	100.00	0.00	0.00
200.00	0.00	0.00	200.00	0.00	0.00
300.00	0.00	0.00	300.00	0.00	0.00
400.00	0.00	0.00	400.00	0.00	0.00
500.00	0.00	0.00	500.00	0.00	0.00
600.00	0.00	0.00	600.00	0.00	0.00
700.00	0.00	0.00	700.00	0.00	0.00
800.00	0.00	0.00	800.00	0.00	0.00
900.00	0.00	0.00	900.00	0.00	0.00
1000.00	0.00	0.00	1000.00	0.00	0.00
1100.00	0.00	0.00	1100.00	0.00	0.00
1200.00	0.00	0.00	1200.00	0.00	0.00
1300.00	0.00	0.00	1300.00	0.00	0.00
1400.00	0.00	0.00	1400.00	0.00	0.00
1500.00	0.00	0.00	1500.00	0.00	0.00
1600.00	0.00	0.00	1600.00	0.00	0.00
1700.00	0.00	0.00	1700.00	0.00	0.00
1800.00	0.00	0.00	1800.00	0.00	0.00
1900.00	0.00	0.00	1900.00	0.00	0.00
2000.00	0.00	0.00	2000.00	0.00	0.00
2100.00	0.00	0.00	2100.00	0.00	0.00
2200.00	0.00	0.00	2200.00	0.00	0.00
2300.00	0.00	0.00	2300.00	0.00	0.00
2400.00	0.00	0.00	2400.00	0.00	0.00
2500.00	0.00	0.00	2500.00	0.00	0.00
2600.00	0.00	0.00	2600.00	0.00	0.00
2700.00	0.00	0.00	2700.00	0.00	0.00
2800.00	0.00	0.00	2800.00	0.00	0.00
2900.00	0.00	0.00	2900.00	0.00	0.00
3000.00	0.00	0.00	3000.00	0.00	0.00
3100.00	0.00	0.00	3100.00	0.00	0.00
3200.00	0.00	0.00	3200.00	0.00	0.00
3300.00	0.00	0.00	3300.00	0.00	0.00
3400.00	0.00	0.00	3400.00	0.00	0.00
3500.00	0.00	0.00	3500.00	0.00	0.00
3600.00	0.00	0.00	3600.00	0.00	0.00
3700.00	0.00	0.00	3700.00	0.00	0.00
3800.00	0.00	0.00	3800.00	0.00	0.00
3900.00	0.00	0.00	3900.00	0.00	0.00
4000.00	0.00	0.00	4000.00	0.00	0.00



			Plan 1.txt		
4100.00	0.00	0.00	4100.00	0.00	0.00
4200.00	0.00	0.00	4200.00	0.00	0.00
4300.00	0.00	0.00	4300.00	0.00	0.00
4400.00	0.00	0.00	4400.00	0.00	0.00
4500.00	0.00	0.00	4500.00	0.00	0.00
4600.00	0.00	0.00	4600.00	0.00	0.00
4700.00	0.00	0.00	4700.00	0.00	0.00
4800.00	0.00	0.00	4800.00	0.00	0.00
4900.00	0.00	0.00	4900.00	0.00	0.00
5000.00	0.00	0.00	5000.00	0.00	0.00
5100.00	0.00	0.00	5100.00	0.00	0.00
5200.00	0.00	0.00	5200.00	0.00	0.00
5300.00	0.00	0.00	5300.00	0.00	0.00
5400.00	0.00	0.00	5400.00	0.00	0.00
5500.00	0.00	0.00	5500.00	0.00	0.00
5600.00	0.00	0.00	5600.00	0.00	0.00
5700.00	0.00	0.00	5700.00	0.00	0.00
5800.00	0.00	0.00	5800.00	0.00	0.00
5900.00	0.00	0.00	5900.00	0.00	0.00
6000.00	0.00	0.00	6000.00	0.00	0.00
6100.00	0.00	0.00	6100.00	0.00	0.00
6200.00	0.00	0.00	6200.00	0.00	0.00
6241.54	0.00	0.00	6241.54	0.00	0.00
6250.00	1.02	0.14	6250.00	0.07	0.00
6275.00	4.02	0.14	6274.97	1.17	0.00
6300.00	7.02	0.14	6299.85	3.57	0.01
6325.00	10.02	0.14	6324.58	7.28	0.02
6350.00	13.02	0.14	6349.07	12.27	0.03
6375.00	16.02	0.14	6373.27	18.53	0.05
6400.00	19.02	0.14	6397.11	26.05	0.06
6425.00	22.02	0.14	6420.52	34.81	0.09
6450.00	25.02	0.14	6443.44	44.79	0.11
6475.00	28.02	0.14	6465.81	55.95	0.14
6500.00	31.02	0.14	6487.56	68.26	0.17
6525.00	34.02	0.14	6508.64	81.70	0.20
6550.00	37.02	0.14	6528.99	96.22	0.24
6575.00	40.02	0.14	6548.55	111.79	0.27
6600.00	43.02	0.14	6567.26	128.36	0.31
6625.00	46.02	0.14	6585.09	145.88	0.36
6650.00	49.02	0.14	6601.97	164.31	0.40
6675.00	52.02	0.14	6617.87	183.61	0.45
6700.00	55.02	0.14	6632.73	203.71	0.50
6725.00	58.02	0.14	6646.52	224.55	0.55
6750.00	61.02	0.14	6659.20	246.10	0.60
6775.00	64.02	0.14	6670.74	268.27	0.66
6800.00	67.02	0.14	6681.10	291.02	0.71
6825.00	70.02	0.14	6690.25	314.28	0.77
6850.00	73.02	0.14	6698.18	337.99	0.83
6875.00	76.02	0.14	6704.85	362.08	0.89
6900.00	79.02	0.14	6710.26	386.48	0.95
6925.00	82.02	0.14	6714.38	411.14	1.01
6950.00	85.02	0.14	6717.20	435.98	1.07
6975.00	88.02	0.14	6718.72	460.93	1.13
6991.54	90.00	0.14	6719.00	477.46	1.17
7000.00	90.00	0.14	6719.00	485.92	1.19
7100.00	90.00	0.14	6719.00	585.92	1.43
7200.00	90.00	0.14	6719.00	685.92	1.68
7300.00	90.00	0.14	6719.00	785.92	1.92
7400.00	90.00	0.14	6719.00	885.92	2.17
7500.00	90.00	0.14	6719.00	985.92	2.41
7600.00	90.00	0.14	6719.00	1085.92	2.66
7700.00	90.00	0.14	6719.00	1185.92	2.90
7800.00	90.00	0.14	6719.00	1285.92	3.15

				Plan 1.txt	
7900.00	90.00	0.14	6719.00	1385.92	3.39
8000.00	90.00	0.14	6719.00	1485.92	3.64
8100.00	90.00	0.14	6719.00	1585.92	3.88
8200.00	90.00	0.14	6719.00	1685.92	4.13
8300.00	90.00	0.14	6719.00	1785.92	4.37
8400.00	90.00	0.14	6719.00	1885.92	4.62
8500.00	90.00	0.14	6719.00	1985.92	4.86
8600.00	90.00	0.14	6719.00	2085.92	5.11
8700.00	90.00	0.14	6719.00	2185.92	5.35
8800.00	90.00	0.14	6719.00	2285.92	5.60
8900.00	90.00	0.14	6719.00	2385.92	5.84
9000.00	90.00	0.14	6719.00	2485.92	6.09
9100.00	90.00	0.14	6719.00	2585.92	6.33
9200.00	90.00	0.14	6719.00	2685.92	6.58
9300.00	90.00	0.14	6719.00	2785.92	6.82
9400.00	90.00	0.14	6719.00	2885.92	7.07
9500.00	90.00	0.14	6719.00	2985.92	7.31
9600.00	90.00	0.14	6719.00	3085.92	7.56
9700.00	90.00	0.14	6719.00	3185.92	7.80
9800.00	90.00	0.14	6719.00	3285.91	8.05
9900.00	90.00	0.14	6719.00	3385.91	8.29
10000.00	90.00	0.14	6719.00	3485.91	8.54
10100.00	90.00	0.14	6719.00	3585.91	8.78
10200.00	90.00	0.14	6719.00	3685.91	9.03
10300.00	90.00	0.14	6719.00	3785.91	9.27
10400.00	90.00	0.14	6719.00	3885.91	9.52
10500.00	90.00	0.14	6719.00	3985.91	9.76
10600.00	90.00	0.14	6719.00	4085.91	10.00
10700.00	90.00	0.14	6719.00	4185.91	10.25
10800.00	90.00	0.14	6719.00	4285.91	10.49
10900.00	90.00	0.14	6719.00	4385.91	10.74
11000.00	90.00	0.14	6719.00	4485.91	10.98
11100.00	90.00	0.14	6719.00	4585.91	11.23
11200.00	90.00	0.14	6719.00	4685.91	11.47
11243.34	90.00	0.14	6719.00	4729.25	11.58