

HOBBS OCD

MAR 12 2019

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EOG Resources - Midland

Lea County, NM (NAD 83 NME)

Jolly Roger 16 State

#707H

OH

Design: OH

Midland PVA

12 January, 2019



Midland PVA

Company:	EOG Resources - Midland	Local Co-ordinate Reference:	Well #707H
Project:	Lea County, NM (NAD 83 NME)	TVD Reference:	KB = 25 @ 3555.0usft
Site:	Jolly Roger 16 State	MD Reference:	KB = 25 @ 3555.0usft
Well:	#707H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000.14

Project	Lea County, NM (NAD 83 NME)		
Map System:	US State Plane 1983	System Datum:	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	New Mexico Eastern Zone		

Site	Jolly Roger 16 State		
Site Position:		Northing:	445,511.00 usft
From:	Map	Easting:	804,489.00 usft
Position Uncertainty:	0.0 usft	Slot Radius:	13-3/16 "
		Latitude:	32° 13' 18.918 N
		Longitude:	103° 28' 58.577 W
		Grid Convergence:	0.45 "

Well	#707H		
Well Position	+N/-S	0.0 usft	Northing:
	+E/-W	0.0 usft	Easting:
Position Uncertainty	0.0 usft	Wellhead Elevation:	usft
		Latitude:	32° 12' 43.215 N
		Longitude:	103° 28' 37.529 W
		Ground Level:	3,530.0 usft

Wellbore	OH		
Magnetics	Model Name	Sample Date	Declination
	IGRF2015	11/27/2018	8.75
			Dip Angle
			60.05
			Field Strength
			47,791.30549218

Design	OH		
Audit Notes:			
Version:	1.0	Phase:	ACTUAL
		Tie On Depth:	0.0
Vertical Section:	Depth From (TVD)	+N/-S	+E/-W
	(usft)	(usft)	(usft)
	0.0	0.0	0.0
			Direction
			355.55

Survey Program	Date 1/12/2019		
From (usft)	To (usft)	Survey (Wellbore)	Tool Name
155.0	17,084.0	Total MWD (OH)	MWD
			Description
			OWSG MWD - Standard



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Well:	#707H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000.14

Survey											
MD (usft)	Inc (°)	Azi (azimuth) (°)	TVD (usft)	N/S (usft)	E/W (usft)	DLeg (°/100usft)	Build (°/100usft)	Turn (°/100usft)	High to Plan (usft)	Right to Plan (usft)	
0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.00	0.0	0.0	0.0
155.0	0.60	71.50	155.0	0.3	0.8	0.39	0.39	0.00	-0.8	0.0	
244.0	0.60	73.00	244.0	0.5	1.7	0.02	0.00	1.69	-1.7	0.0	
333.0	0.70	76.60	333.0	0.8	2.6	0.12	0.11	4.04	-2.7	0.2	
422.0	0.70	98.70	422.0	0.8	3.7	0.30	0.00	24.83	-3.5	1.4	
520.0	0.50	66.70	520.0	0.9	4.7	0.39	-0.20	-32.65	-4.7	-1.0	
613.0	0.50	85.90	613.0	1.1	5.5	0.18	0.00	20.65	-5.5	0.7	
800.0	0.40	90.40	800.0	1.2	6.9	0.06	-0.05	2.41	-6.9	1.2	
893.0	0.30	82.40	893.0	1.2	7.5	0.12	-0.11	-8.60	-7.6	0.2	
987.0	0.30	186.90	987.0	1.0	7.7	0.50	0.00	111.17	1.9	7.5	
1,173.0	0.10	128.90	1,173.0	0.4	7.8	0.14	-0.11	-31.18	-5.8	5.2	
1,285.0	0.30	135.50	1,285.0	0.1	8.1	0.18	0.18	5.89	-5.6	5.8	
1,432.0	0.80	288.20	1,432.0	0.2	7.4	0.73	0.34	103.88	7.2	-4.0	
1,526.0	2.20	231.50	1,525.9	-0.7	5.3	2.00	1.49	-60.32	7.8	2.1	
1,620.0	4.30	213.90	1,619.8	-4.8	1.9	2.45	2.23	-18.72	6.0	3.4	
1,714.0	5.00	210.60	1,713.5	-11.2	-2.1	0.80	0.74	-3.51	4.1	3.3	
1,902.0	5.00	210.80	1,900.7	-25.3	-10.5	0.01	0.00	0.11	0.9	2.8	
1,997.0	5.00	211.90	1,995.4	-32.4	-14.8	0.10	0.00	1.16	-0.7	2.5	
2,091.0	5.00	212.30	2,089.0	-39.3	-19.1	0.04	0.00	0.43	-2.4	2.1	
2,185.0	4.90	216.30	2,182.7	-46.0	-23.7	0.38	-0.11	4.26	-3.8	1.6	
2,280.0	4.80	219.00	2,277.3	-52.4	-28.6	0.26	-0.11	2.84	-5.3	0.8	
2,374.0	4.70	224.30	2,371.0	-58.2	-33.8	0.48	-0.11	5.64	-5.7	-0.2	
2,468.0	4.80	224.60	2,464.7	-63.8	-39.2	0.11	0.11	0.32	-8.1	-2.0	
2,562.0	4.70	226.90	2,558.4	-69.2	-44.8	0.23	-0.11	2.45	-9.8	-3.5	
2,657.0	4.40	230.40	2,653.1	-74.2	-50.4	0.43	-0.32	3.68	-11.4	-5.2	
2,751.0	4.30	233.50	2,746.8	-78.6	-56.1	0.27	-0.11	3.30	-12.8	-7.1	
2,845.0	4.70	218.00	2,840.5	-83.7	-61.3	1.36	0.43	-16.49	-11.2	-12.3	



Midland PVA

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Well:	#707H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000.14

Survey											
MD (usft)	Inc (°)	Azi (azimuth) (°)	TVD (usft)	N/S (usft)	E/W (usft)	D/Leg (°/100usft)	Build (°/100usft)	Turn (°/100usft)	High to Plan (usft)	Right to Plan (usft)	
2,940.0	5.00	219.10	2,935.2	-90.0	-66.3	0.33	0.32	1.16	-13.0	-13.3	
3,034.0	4.50	201.60	3,028.9	-96.6	-70.2	1.62	-0.53	-18.62	-9.5	-17.0	
3,128.0	4.60	197.20	3,122.6	-103.6	-72.7	0.39	0.11	-4.68	-9.2	-16.7	
3,222.0	4.20	197.60	3,216.3	-110.5	-74.8	0.43	-0.43	0.43	-10.1	-15.4	
3,317.0	3.90	198.20	3,311.0	-116.9	-76.9	0.32	-0.32	0.63	-10.4	-14.0	
3,411.0	3.50	197.60	3,404.8	-122.7	-78.8	0.43	-0.43	-0.64	-9.9	-13.0	
3,505.0	3.20	196.20	3,498.7	-127.9	-80.4	0.33	-0.32	-1.49	-8.7	-11.9	
3,599.0	2.90	194.70	3,592.6	-132.7	-81.7	0.33	-0.32	-1.60	-7.0	-10.6	
3,694.0	2.60	192.00	3,687.4	-137.2	-82.8	0.34	-0.32	-2.84	-4.7	-9.2	
3,788.0	5.00	223.50	3,781.2	-142.2	-86.0	3.29	2.55	33.51	-8.3	-6.0	
3,883.0	4.60	222.60	3,875.9	-148.0	-91.5	0.43	-0.42	-0.85	-9.8	-7.8	
3,976.0	3.80	220.70	3,968.7	-153.1	-96.0	0.87	-0.86	-2.04	-10.0	-9.6	
4,070.0	4.00	220.30	4,062.4	-158.0	-100.1	0.21	0.21	-0.43	-9.9	-11.1	
4,164.0	4.00	219.50	4,156.2	-163.0	-104.3	0.06	0.00	-0.85	-9.8	-12.5	
4,258.0	4.00	215.50	4,250.0	-168.2	-108.3	0.30	0.00	-4.26	-9.0	-14.2	
4,352.0	3.60	215.00	4,343.8	-173.3	-111.9	0.43	-0.43	-0.53	-8.6	-15.0	
4,447.0	2.90	209.00	4,438.6	-177.8	-114.8	0.82	-0.74	-6.32	-5.7	-16.2	
4,541.0	2.90	175.90	4,532.5	-182.3	-115.8	1.76	0.00	-35.21	5.2	-14.6	
4,635.0	4.20	174.10	4,626.3	-188.1	-115.3	1.39	1.38	-1.91	5.3	-10.7	
4,729.0	5.00	197.00	4,720.0	-195.4	-116.1	2.11	0.85	24.36	-0.1	-9.3	
4,823.0	5.00	186.30	4,813.7	-203.4	-117.8	0.99	0.00	-11.38	-0.6	-7.4	
4,918.0	6.00	186.20	4,908.2	-212.5	-118.7	1.05	1.05	-0.11	-3.4	-4.9	
5,012.0	6.90	180.30	5,001.6	-223.0	-119.3	1.19	0.96	-6.28	-7.7	-2.7	
5,107.0	7.70	191.50	5,095.9	-234.9	-120.6	1.71	0.84	11.79	-13.7	1.9	
5,201.0	7.90	210.60	5,189.0	-246.7	-125.1	2.75	0.21	20.32	-18.2	8.1	
5,296.0	7.30	215.80	5,283.2	-257.2	-132.0	0.96	-0.63	5.47	-23.0	9.4	
5,390.0	6.60	214.60	5,376.5	-266.5	-138.6	0.76	-0.74	-1.28	-24.8	7.7	



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5,484.0	6.70	213.70	5,469.9	-275.5	-144.7	0.15	0.11	-0.96	-23.0	6.0	
5,578.0	6.60	213.70	5,563.2	-284.5	-150.7	0.11	-0.11	0.00	-18.0	4.6	
5,672.0	6.80	212.80	5,656.6	-293.7	-156.7	0.24	0.21	-0.96	-11.7	2.9	
5,767.0	6.70	210.40	5,750.9	-303.2	-162.6	0.32	-0.11	-2.53	-5.4	1.6	
5,861.0	8.50	207.40	5,844.1	-314.1	-168.5	1.96	1.91	-3.19	-0.5	1.3	
5,955.0	9.10	205.10	5,937.0	-327.0	-174.9	0.74	0.64	-2.45	2.5	2.0	
6,049.0	9.10	204.80	6,029.8	-340.5	-181.2	0.05	0.00	-0.32	5.0	3.1	
6,143.0	10.00	206.20	6,122.5	-354.6	-187.9	0.99	0.96	1.49	6.8	3.8	
6,237.0	9.90	207.70	6,215.1	-369.1	-195.3	0.30	-0.11	1.60	8.0	4.1	
6,331.0	9.50	205.80	6,307.7	-383.2	-202.4	0.54	-0.43	-2.02	9.4	4.9	
6,426.0	9.10	205.10	6,401.5	-397.1	-209.0	0.44	-0.42	-0.74	11.5	5.9	
6,520.0	8.60	205.60	6,494.4	-410.1	-215.2	0.54	-0.53	0.53	14.5	6.7	
6,614.0	8.40	205.50	6,587.3	-422.7	-221.2	0.21	-0.21	-0.11	18.0	7.6	
6,708.0	8.20	205.30	6,680.4	-434.9	-227.0	0.21	-0.21	-0.21	21.8	8.6	
6,802.0	8.00	205.10	6,773.4	-446.9	-232.6	0.21	-0.21	-0.21	25.9	9.7	
6,896.0	7.70	205.60	6,866.5	-458.5	-238.1	0.33	-0.32	0.53	30.5	10.4	
6,990.0	7.50	205.20	6,959.7	-469.7	-243.5	0.22	-0.21	-0.43	35.4	11.5	
7,084.0	6.90	205.60	7,053.0	-480.4	-248.5	0.64	-0.64	0.43	41.1	12.2	
7,179.0	6.50	207.10	7,147.3	-490.3	-253.4	0.46	-0.42	1.58	47.9	11.7	
7,273.0	6.10	207.90	7,240.8	-499.5	-258.2	0.44	-0.43	0.85	53.3	11.2	
7,368.0	5.80	208.20	7,335.2	-508.1	-262.8	0.32	-0.32	0.32	56.1	11.0	
7,462.0	5.60	208.00	7,428.8	-516.4	-267.2	0.21	-0.21	-0.21	56.1	11.2	
7,557.0	5.30	208.60	7,523.4	-524.3	-271.5	0.32	-0.32	0.63	53.4	10.7	
7,746.0	4.10	211.70	7,711.7	-537.7	-279.2	0.65	-0.63	1.64	41.7	8.1	
7,840.0	3.90	214.80	7,805.5	-543.2	-282.8	0.31	-0.21	3.30	35.5	6.0	
7,934.0	3.50	209.80	7,899.3	-548.3	-286.1	0.55	-0.43	-5.32	28.8	8.8	
8,028.0	3.30	212.80	7,993.1	-553.1	-288.9	0.28	-0.21	3.19	23.7	7.4	



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8,122.0	3.00	214.00	8,087.0	-557.4	-291.8	0.33	-0.32	1.28	18.7	7.0	
8,216.0	2.70	215.90	8,180.9	-561.2	-294.5	0.33	-0.32	2.02	14.2	6.4	
8,310.0	2.50	217.80	8,274.8	-564.7	-297.0	0.23	-0.21	2.02	10.2	6.0	
8,405.0	2.30	221.70	8,369.7	-567.7	-299.6	0.27	-0.21	4.11	6.6	5.5	
8,499.0	2.10	226.60	8,463.6	-570.3	-302.1	0.29	-0.21	5.21	3.4	5.0	
8,593.0	1.90	231.60	8,557.6	-572.5	-304.5	0.28	-0.21	5.32	0.6	4.9	
8,687.0	1.80	238.20	8,651.5	-574.2	-307.0	0.25	-0.11	7.02	-1.9	5.0	
8,781.0	1.70	243.40	8,745.5	-575.6	-309.5	0.20	-0.11	5.53	-4.3	5.2	
8,876.0	1.70	248.40	8,840.4	-576.8	-312.1	0.16	0.00	5.26	-6.7	5.7	
8,971.0	1.60	263.80	8,935.4	-577.4	-314.7	0.48	-0.11	16.21	-7.6	7.7	
9,064.0	1.50	272.10	9,028.4	-577.5	-317.2	0.26	-0.11	8.92	-8.9	8.9	
9,159.0	1.50	274.80	9,123.3	-577.4	-319.7	0.07	0.00	2.84	-11.0	9.3	
9,253.0	0.80	331.80	9,217.3	-576.7	-321.2	1.34	-0.74	60.64	0.5	15.3	
9,346.0	0.80	344.60	9,310.3	-575.5	-321.7	0.19	0.00	13.76	2.6	14.9	
9,440.0	1.20	326.50	9,404.3	-574.0	-322.4	0.54	0.43	-19.26	-3.8	14.8	
9,533.0	1.80	325.50	9,497.2	-572.0	-323.8	0.65	0.65	-1.08	-6.5	14.7	
9,627.0	2.30	320.10	9,591.2	-569.4	-325.8	0.57	0.53	-5.74	-11.2	13.9	
9,722.0	0.90	10.20	9,686.2	-567.2	-326.9	1.95	-1.47	52.74	1.5	19.0	
9,815.0	1.10	34.30	9,779.1	-565.7	-326.3	0.50	0.22	25.91	7.6	17.0	
9,909.0	1.00	33.70	9,873.1	-564.3	-325.3	0.11	-0.11	-0.64	5.7	17.0	
10,003.0	0.30	9.20	9,967.1	-563.4	-324.8	0.78	-0.74	-28.06	-2.9	17.5	
10,096.0	0.60	287.90	10,060.1	-563.0	-325.3	0.68	0.32	-87.42	-18.3	-0.4	
10,190.0	0.50	263.40	10,154.1	-562.9	-326.1	0.27	-0.11	-26.06	-17.3	-8.2	
10,284.0	0.60	221.80	10,248.1	-563.3	-326.9	0.43	0.11	-44.26	-8.3	-17.9	
10,378.0	0.70	211.30	10,342.1	-564.1	-327.5	0.17	0.11	-11.17	-6.0	-19.2	
10,472.0	0.70	224.80	10,436.1	-565.0	-328.2	0.18	0.00	14.36	-11.4	-17.1	
10,567.0	1.00	225.10	10,531.1	-566.0	-329.2	0.32	0.32	0.32	-12.9	-17.1	



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10,681.0	1.10	220.80	10,625.1	-567.3	-330.4	0.14	0.11	-4.57	-13.3	-18.1	
10,755.0	1.20	214.00	10,719.0	-568.8	-331.5	0.18	0.11	-7.23	-13.0	-19.6	
10,849.0	1.60	223.00	10,813.0	-570.6	-333.0	0.48	0.43	9.57	-18.2	-17.2	
10,943.0	1.50	201.10	10,907.0	-572.7	-334.3	0.64	-0.11	-23.30	-12.9	-23.2	
11,036.0	1.50	191.70	11,000.0	-575.0	-335.0	0.26	0.00	-10.11	-11.3	-25.2	
11,131.0	1.30	195.30	11,094.9	-577.3	-335.5	0.23	-0.21	3.79	-15.2	-24.4	
11,225.0	1.30	204.20	11,188.9	-579.3	-336.2	0.21	0.00	9.47	-20.9	-21.6	
11,319.0	1.70	208.30	11,282.9	-581.5	-337.3	0.44	0.43	4.36	-24.9	-19.9	
11,413.0	1.80	227.90	11,376.8	-583.7	-339.1	0.64	0.11	20.85	-32.9	-10.0	
11,507.0	1.70	232.80	11,470.8	-585.5	-341.3	0.19	-0.11	5.21	-36.5	-7.0	
11,586.0	1.80	241.10	11,549.7	-586.8	-343.3	0.34	0.13	10.51	-39.5	-1.5	
11,648.0	1.70	112.80	11,611.7	-587.6	-343.3	5.08	-0.16	-206.94	25.3	-30.9	
11,700.0	1.20	7.26	11,663.7	-587.4	-342.5	4.48	-0.96	-202.95	22.6	31.9	
KOP 11700.0' MD; 11663.7' TVD; -587.4'; -342.5'; 1.20											
11,719.0	1.90	348.90	11,682.7	-586.9	-342.6	4.48	3.69	-96.66	10.9	37.4	
11,766.0	10.30	6.40	11,729.4	-581.9	-342.3	18.10	17.87	37.23	19.3	32.3	
11,813.0	17.20	14.70	11,775.0	-571.0	-340.0	15.23	14.68	17.66	19.3	28.1	
11,860.0	23.90	20.90	11,819.0	-555.4	-334.9	14.97	14.26	13.19	15.9	22.7	
11,907.0	30.30	24.40	11,860.8	-535.7	-326.6	14.03	13.62	7.45	9.5	15.8	
11,941.8	33.92	26.54	11,890.3	-519.0	-318.6	10.91	10.41	6.16	3.9	9.4	
FTP Crossing 11941.8' MD; 11890.3' TVD; -519.0'; -318.6'; 33.92											
11,954.0	35.20	27.20	11,900.4	-512.8	-315.5	10.91	10.47	5.39	1.9	6.8	
12,001.0	40.60	24.90	11,937.4	-486.9	-302.8	11.87	11.49	-4.89	-6.2	-4.0	
12,048.0	45.60	15.50	11,971.8	-456.8	-291.9	17.30	10.64	-20.00	-11.7	-15.0	
12,095.0	49.60	4.20	12,003.5	-422.7	-266.1	19.67	8.51	-24.04	-13.9	-22.5	
12,142.0	53.40	354.00	12,032.8	-386.0	-266.7	18.79	8.09	-21.70	-14.5	-23.8	
12,190.0	55.90	354.30	12,060.6	-347.1	-290.7	5.23	5.21	0.62	-15.9	-20.1	



Midland PVA

Company:	EOG Resources - Midland	Local Co-ordinate Reference:	Well #707H
Project:	Lea County, NM (NAD 83 NME)	TVD Reference:	KB = 25 @ 3555.0usft
Site:	Jolly Roger 16 State	MD Reference:	KB = 25 @ 3555.0usft
Well:	#707H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000.14

Survey											
MD (usft)	Inc (°)	Azi (azimuth) (°)	TVD (usft)	NS (usft)	EAW (usft)	DLeg (°/100usft)	Build (°/100usft)	Turn (°/100usft)	High to Plan (usft)	Right to Plan (usft)	
12,285.0	68.20	357.10	12,105.0	-263.5	-296.9	13.20	12.95	2.95	-16.4	-14.1	
12,332.0	77.70	359.10	12,118.8	-218.7	-298.3	20.62	20.21	4.26	-18.2	-12.9	
12,379.0	83.40	358.90	12,126.5	-172.3	-299.2	12.13	12.13	-0.43	-21.2	-12.5	
12,426.0	89.30	358.40	12,129.5	-125.5	-300.3	12.60	12.55	-1.06	-24.2	-11.8	
12,473.0	93.20	358.60	12,128.5	-78.5	-301.5	8.31	8.30	0.43	-26.5	-10.9	
12,567.0	91.00	359.00	12,125.0	15.4	-303.5	2.38	-2.34	0.43	-29.7	-9.8	
12,661.0	89.80	359.30	12,124.4	109.4	-304.8	1.32	-1.28	0.32	-29.6	-9.3	
12,756.0	88.60	359.20	12,125.7	204.4	-306.1	1.27	-1.26	-0.11	-27.5	-8.9	
12,850.0	87.90	359.30	12,128.6	298.3	-307.3	0.75	-0.74	0.11	-23.8	-8.5	
12,944.0	89.30	359.40	12,130.9	392.3	-308.4	1.49	1.49	0.11	-20.7	-8.3	
13,038.0	89.20	358.80	12,132.1	486.3	-309.9	0.65	-0.11	-0.64	-18.7	-7.6	
13,133.0	90.80	358.00	12,132.1	581.2	-312.5	1.88	1.68	-0.84	-17.9	-5.8	
13,227.0	88.60	357.60	12,132.6	675.1	-316.1	2.38	-2.34	-0.43	-16.7	-3.1	
13,321.0	89.90	359.70	12,133.8	769.1	-318.3	2.63	1.38	2.23	-14.7	-1.7	
13,415.0	91.50	2.00	12,132.7	863.1	-316.9	2.98	1.70	2.45	-15.0	-3.9	
13,509.0	92.00	1.60	12,129.8	957.0	-314.0	0.68	0.53	-0.43	-17.1	-7.7	
13,603.0	91.40	359.80	12,127.0	1,050.9	-312.8	2.02	-0.64	-1.91	-19.1	-9.7	
13,698.0	91.50	358.60	12,124.6	1,145.9	-314.2	1.27	0.11	-1.26	-20.7	-9.2	
13,792.0	91.00	359.10	12,122.6	1,239.8	-316.1	0.75	-0.53	0.53	-22.0	-8.2	
13,886.0	92.20	359.60	12,120.0	1,333.8	-317.1	1.38	1.28	0.53	-23.8	-8.0	
13,980.0	90.00	0.10	12,118.1	1,427.8	-317.4	2.40	-2.34	0.53	-24.9	-8.6	
14,075.0	89.20	359.50	12,118.8	1,522.8	-317.7	1.05	-0.84	-0.63	-23.4	-9.1	
14,170.0	90.10	0.20	12,119.4	1,617.8	-318.0	1.20	0.95	0.74	-22.0	-9.7	
14,264.0	89.20	359.40	12,120.0	1,711.8	-318.3	1.28	-0.96	-0.85	-20.7	-10.2	
14,358.0	89.90	0.00	12,120.7	1,805.8	-318.8	0.98	0.74	0.64	-19.2	-10.6	
14,453.0	89.50	359.50	12,121.2	1,900.8	-319.2	0.67	-0.42	-0.53	-17.9	-11.0	
14,547.0	89.40	0.10	12,122.1	1,994.8	-319.5	0.65	-0.11	0.64	-16.2	-11.5	



Midland PVA

Company:	EOG Resources - Midland	Local Co-ordinate Reference:	Well #707H
Project:	Lea County, NM (NAD 83 NME)	TVD Reference:	KB = 25 @ 3555.0usft
Site:	Jolly Roger 16 State	MD Reference:	KB = 25 @ 3555.0usft
Well:	#707H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000.14

MD (usft)	Inc (°)	Asl (azimuth) (°)	TVD (usft)	N/S (usft)	E/W (usft)	D/Leg (°/100usft)	Build (°/100usft)	Turn (°/100usft)	High to Plan (usft)	Right to Plan (usft)
14,641.0	90.80	0.30	12,121.9	2,088.8	-319.2	1.50	1.49	0.21	-15.6	-12.7
14,735.0	91.30	0.00	12,120.2	2,182.7	-318.9	0.62	0.53	-0.32	-16.5	-13.8
14,829.0	89.40	359.20	12,119.6	2,276.7	-319.6	2.19	-2.02	-0.85	-16.3	-14.0
14,923.0	90.20	359.90	12,120.0	2,370.7	-320.3	1.13	0.85	0.74	-15.2	-14.1
15,017.0	90.90	359.90	12,119.1	2,464.7	-320.5	0.74	0.74	0.00	-15.3	-14.8
15,111.0	92.40	0.70	12,116.4	2,558.7	-320.0	1.81	1.60	0.85	-17.2	-16.1
15,205.0	91.20	0.20	12,113.4	2,652.6	-319.3	1.38	-1.28	-0.53	-19.4	-17.7
15,300.0	90.70	358.90	12,111.8	2,747.6	-320.0	1.47	-0.53	-1.37	-20.0	-17.8
15,395.0	90.50	359.90	12,110.8	2,842.6	-321.0	1.07	-0.21	1.05	-20.0	-17.7
15,489.0	92.60	0.10	12,108.3	2,936.6	-321.0	2.24	2.23	0.21	-21.5	-18.5
15,583.0	89.00	358.00	12,107.0	3,030.5	-322.6	4.43	-3.83	-2.23	-21.9	-17.8
15,678.0	86.80	357.60	12,110.5	3,125.4	-326.2	2.35	-2.32	-0.42	-17.4	-15.0
15,773.0	91.10	357.70	12,112.2	3,220.2	-330.1	4.53	4.53	0.11	-14.7	-11.9
15,867.0	90.90	358.60	12,110.6	3,314.2	-333.1	0.98	-0.21	0.96	-15.3	-9.8
15,961.0	90.40	358.00	12,109.5	3,408.1	-335.9	0.83	-0.53	-0.64	-15.4	-7.8
16,056.0	90.10	358.50	12,109.1	3,503.1	-338.8	0.61	-0.32	0.53	-14.8	-5.8
16,150.0	90.60	359.00	12,108.5	3,597.1	-340.9	0.75	0.53	0.53	-14.4	-4.6
16,244.0	91.30	359.00	12,106.9	3,691.0	-342.5	0.74	0.74	0.00	-15.0	-3.8
16,338.0	92.00	359.60	12,104.2	3,785.0	-343.7	0.98	0.74	0.64	-16.7	-3.5
16,432.0	90.30	0.60	12,102.4	3,879.0	-343.5	2.10	-1.81	1.06	-17.6	-4.5
16,526.0	89.10	0.40	12,102.8	3,973.0	-342.7	1.29	-1.28	-0.21	-16.2	-6.1
16,621.0	90.60	359.10	12,103.1	4,068.0	-343.1	2.09	1.58	-1.37	-14.9	-6.6
16,715.0	90.00	0.10	12,102.6	4,162.0	-343.8	1.24	-0.64	1.06	-14.4	-6.8
16,809.0	88.50	359.60	12,103.8	4,255.9	-344.0	1.68	-1.60	-0.53	-12.2	-7.4
16,903.0	89.20	0.20	12,105.7	4,349.9	-344.2	0.98	0.74	0.64	-9.4	-8.0
17,027.0	89.70	0.80	12,106.9	4,473.9	-343.1	0.63	0.40	0.48	-6.9	-10.2

Last MWD Survey (MD = 17027.0)



Midland PVA

Company:	EOG Resources - Midland	Local Co-ordinate Reference:	Well #707H
Project:	Lea County, NM (NAD 83 NME)	TVD Reference:	KB = 25 @ 3555.0usft
Site:	Jolly Roger 16 State	MD Reference:	KB = 25 @ 3555.0usft
Well:	#707H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000.14

MD (usft)	Inc (°)	Azi (azimuth) (°)	TVD (usft)	N/S (usft)	E/W (usft)	DLog (°/100usft)	Build (°/100usft)	Turn (°/100usft)	High to Plan (usft)	Right to Plan (usft)
17,084.0	89.70	0.80	12,107.2	4,530.9	-342.3	0.00	0.00	0.00	-6.0	-11.5
Projection to Bit (MD = 17084.0)										

Design Annotations				
Measured Depth (usft)	Vertical Depth (usft)	Local Coordinates		Comment
		+N/-S (usft)	+E/-W (usft)	
11,700.0	11,663.7	-587.4	-342.5	KOP 11700.0' MD; 11663.7' TVD; -587.4'; -342.5'; 1.20
11,941.8	11,890.3	-519.0	-318.6	FTP Crossing 11841.8' MD; 11890.3' TVD; -519.0'; -318.6'; 33.92
17,027.0	12,108.9	4,473.9	-343.1	Last MWD Survey (MD = 17027.0)
17,084.0	12,107.2	4,530.9	-342.3	Projection to Bit (MD = 17084.0)

Checked By: _____	Approved By: _____	Date: _____
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Lea County, NM (NAD 83 NME)

Jolly Roger 16 State #707H

Plan #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: #707H

KB = 25 @ 3555.0usft
Northing 441916.00 Easting 806164.00 Latitude 32° 12' 43.216 N Longitude 103° 28' 37.529 W

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	1300.0	0.00	0.00	1300.0	0.0	0.0	0.00	0.00	0.0	
3	1700.0	4.00	208.43	1699.7	-12.3	-8.8	1.00	208.43	-11.7	
4	5244.0	4.00	208.43	5235.0	-229.7	-124.3	0.00	0.00	-219.3	
5	5575.8	10.64	208.42	5564.0	-266.8	-144.5	2.00	-0.01	-254.8	
6	7170.4	10.64	208.42	7131.2	-525.7	-284.8	0.00	0.00	-502.0	
7	7702.3	0.00	0.00	7660.0	-569.0	-308.0	2.00	180.00	-543.4	Brushy Canyon(Jolly Rogers 16 State #707H)
8	7703.3	0.00	0.00	7661.0	-569.0	-308.0	0.00	0.00	-543.4	
9	11719.8	0.00	0.00	11677.5	-569.0	-308.0	0.00	0.00	-543.4	
10	12469.9	90.00	359.48	12155.0	-91.5	-312.9	12.00	359.48	-87.0	
11	12537.1	90.00	359.48	12155.0	-24.3	-312.9	0.00	0.00	0.0	TGT#1(Jolly Rogers 16 State #707H)
12	12550.7	90.48	359.49	12154.9	-0.7	-313.1	2.00	0.07	23.6	
13	15193.4	90.48	359.49	12133.0	2631.8	-336.8	0.00	0.00	2650.0	TGT#3(Jolly Rogers 16 State #707H)
14	15199.5	90.50	359.49	12132.9	2637.9	-336.8	2.00	-0.05	2656.0	
15	17110.8	90.50	359.49	12113.0	4549.0	-354.0	0.00	0.00	4562.8	PBHL (Jolly Rogers 16 State #707H)

CASING DETAILS

No casing data is available

WELLOBORE TARGET DETAILS (MAP CO-ORDINATES)

Name	TVD	+N-S	+E-W	Northing	Easting
Brushy Canyon(Jolly Rogers 16 State #707H)	7660.0	-569.0	-308.0	441347.00	805846.00
PBHL (Jolly Rogers 16 State #707H)	12113.0	4562.0	-354.0	446455.00	805800.00
FTP (Jolly Rogers 16 State #707H)	12115.0	-919.0	-308.0	441337.00	805846.00
TGT#1(Jolly Rogers 16 State #707H)	12133.0	2631.8	-336.8	444547.80	805817.23
TGT#3(Jolly Rogers 16 State #707H)	12145.0	1193.5	-323.9	442109.50	805830.16
TGT#1(Jolly Rogers 16 State #707H)	12155.0	-24.3	-312.9	441891.70	805841.10

