

HOBBS OCD

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Form 3160-4
(August 2007)

JAN 09 2020

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

JAN 09 2020

FORM APPROVED
OMB No. 1004-0137
Expires: July 31, 2010RECEIVED
WELL COMPLETION OR RECOMPLETION REPORT RECEIVED

1a. Type of Well ☒ Oil Well ☐ Gas Well ☐ Dry ☐ Other		5. Lease Serial No. NMNM66927	
b. Type of Completion ☒ New Well ☐ Work Over ☐ Deepen ☐ Plug Back ☐ Diff. Resvr. Other		6. If Indian, Allottee or Tribe Name	
2. Name of Operator EOG RESOURCES, INC		7. Unit or CA Agreement Name and No.	
Contact: KAY MADDOX E-Mail: KAY_MADDOX@EOGRESOURCES.COM		8. Lease Name and Well No. LOBO BLANCO 9 FEDERAL 704H	
3. Address PO BOX 2267 MIDLAND, TX 79702		9. API Well No. 30-025-46081	
3a. Phone No. (include area code) Ph: 432-686-3658		10. Field and Pool, or Exploratory WC025 G09 S263416B;UP WC	
4. Location of Well (Report location clearly and in accordance with Federal requirements)* Sec 9 T26S R34E Mer NMP At surface SESW 326FSL 1341FWL 32.051595 N Lat, 103.479047 W Lon Sec 9 T26S R34E Mer NMP At top prod interval reported below SESW 348FSL 2301FWL 32.051659 N Lat, 103.475950 W Lon Sec 4 T26S R34E Mer NMP At total depth NENW 111FNL 2295FWL 32.079429 N Lat, 103.475991 W Lon		11. Sec., T., R., M., or Block and Survey or Area Sec 9 T26S R34E Mer NMP	
14. Date Spudded 06/06/2019		15. Date T.D. Reached 08/25/2019	
16. Date Completed ☐ D & A ☒ Ready to Prod. 11/11/2019		17. Elevations (DF, KB, RT, GL)* 3338 GL	
18. Total Depth: MD 23078 TVD 12733		19. Plug Back T.D.: MD 23065 TVD 12733	
20. Depth Bridge Plug Set: MD TVD		21. Type Electric & Other Mechanical Logs Run (Submit copy of each)	
22. Was well cored? ☒ No ☐ Yes (Submit analysis) Was DST run? ☒ No ☐ Yes (Submit analysis) Directional Survey? ☐ No ☒ Yes (Submit analysis)			

23. Casing and Liner Record (Report all strings set in well)

Hole Size	Size/Grade	Wt. (#/ft.)	Top (MD)	Bottom (MD)	Stage Cementer Depth	No. of Sk. & Type of Cement	Slurry Vol. (BBL)	Cement Top*	Amount Pulled
12.500	9.625 J55	40.0		840		480		0	
8.750	7.625 HCP-110	29.7		11883		1542		38	
6.750	5.500 ICYP110	20.0		23067		1045		9090	

24. Tubing Record

Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)

25. Producing Intervals

26. Perforation Record

Formation	Top	Bottom	Perforated Interval	Size	No. Holes	Perf. Status
A) WOLFCAMP	12959	23065	12959 TO 23065	3.250	2132	OPEN
B)						
C)						
D)						

27. Acid, Fracture, Treatment, Cement Squeeze, Etc.

Depth Interval	Amount and Type of Material
12959 TO 23065	26,022,182 LBS PROPPANT; 415,035 BBLs LOAD FLUID

28. Production - Interval A

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
11/11/2019	11/15/2019	24	→	2821.0	4920.0	12778.0	43.0		FLOWS FROM WELL
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status	
64	SI	2654.0	→				1744	POW	ACCEPTED FOR RECORD

28a. Production - Interval B

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
			→						DEC 11 2019
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status	
	SI		→						BUREAU OF LAND MANAGEMENT ROSWELL FIELD OFFICE

(See Instructions and spaces for additional data on reverse side)

ELECTRONIC SUBMISSION #493126 VERIFIED BY THE BLM WELL INFORMATION SYSTEM

** OPERATOR-SUBMITTED ** OPERATOR-SUBMITTED ** OPERATOR-SUBMITTED **

Reclamation due: 05/11/2020

28b. Production - Interval C

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
			→						
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status	
			→						

28c. Production - Interval D

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
			→						
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status	
			→						

29. Disposition of Gas(Sold, used for fuel, vented, etc.)
SOLD

30. Summary of Porous Zones (Include Aquifers):

Show all important zones of porosity and contents thereof: Cored intervals and all drill-stem tests, including depth interval tested, cushion used, time tool open, flowing and shut-in pressures and recoveries.

31. Formation (Log) Markers

Formation	Top	Bottom	Descriptions, Contents, etc.	Name	Top Meas. Depth
RUSTLER	733		BARREN	RUSTLER	733
T/SALT	1057		BARREN	T/SALT	1057
B/SALT	3995		OIL & GAS	B/SALT	3995
BRUSHY CANYON	8120		OIL & GAS	BRUSHY CANYON	8120
1ST BONE SPRING SAND	10615		OIL & GAS	1ST BONE SPRING SAND	10615
2ND BONE SPRING SAND	11138		OIL & GAS	2ND BONE SPRING SAND	11138
3RD BONE SPRING SAND	12208		OIL & GAS	3RD BONE SPRING SAND	12208
WOLFCAMP	12642		OIL & GAS	WOLFCAMP	12642

32. Additional remarks (include plugging procedure):
PLEASE REFERENCE ATTACHMENTS

33. Circle enclosed attachments:

- | | | | |
|---|--------------------|---------------|-----------------------|
| 1. Electrical/Mechanical Logs (1 full set req'd.) | 2. Geologic Report | 3. DST Report | 4. Directional Survey |
| 5. Sundry Notice for plugging and cement verification | 6. Core Analysis | 7 Other: | |

34. I hereby certify that the foregoing and attached information is complete and correct as determined from all available records (see attached instructions):

Electronic Submission #493126 Verified by the BLM Well Information System.
For EOG RESOURCES, INC, sent to the Hobbs
Committed to AFMSS for processing by JENNIFER SANCHEZ on 12/11/2019 ()

Name (please print) KAY MADDOXTitle REGULATORY SPECIALISTSignature (Electronic Submission)Date 11/20/2019

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

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EOG Resources - Midland

Lea County, NM (NAD 83 NME)

Lobo Blanco 9 Fed

#704H

OH

Design: OH

Final PVA Report

30 August, 2019



Final PVA Report

Company:	EQG Resources - Midland		Local Co-ordinate Reference:	Well #704H
Project:	Lea County, NM (NAD 83 NME)		TVD Reference:	KB = 25 @ 3363.0usft
Site:	Lobo Blanco 9 Fed		MD Reference:	KB = 25 @ 3363.0usft
Well:	#704H		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	Lobo Blanco 9 Fed				
Site Position:	Northings:	383,514.00 usft	Latitude:	32° 3' 5.410 N	
From:	Map	Eastings:	805,018.00 usft	Longitude:	103° 28' 58.122 W
Position Uncertainty:	0.0 usft	Spot Radius:	13-3/16 "	Grid Convergence:	0.45 °

Well	#704H					
Well Position	+N-S	0.0 usft	Northings:	383,555.00 usft	Latitude:	32° 3' 5.738 N
	+E-W	0.0 usft	Eastings:	808,012.00 usft	Longitude:	103° 28' 44.569 W
Position Uncertainty	0.0 usft	Wellhead Elevation:	usft	Ground Level:	3,338.0 usft	

Wellbore	OH				
Magnetics:	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2015	12/17/2016	6.73	59.90	47,891.79764767

Design	OH				
Auth Notes:					
Version:	1.0	Phase:	ACTUAL	Tie On Depth:	0.0
Vertical Section:	Depth From (TVD) (usft)	+N-S (usft)	+E-W (usft)	Direction (°)	
	0.0	0.0	0.0	4.99	

Survey Program	Date: 8/30/2019			
From (usft)	To (usft)	Survey (Wellbore)	Tool Name	Description
132.0	23,978.0	Intrepid MWD #1 (OH)	MWD	OWSG MWD - Standard



Final PVA Report

Company:	EDG Resources - Midland	Local Co-ordinate Reference:	Well #704H
Project:	Lea County, NM (NAD 83 NME)	TVD Reference:	KB = 25 @ 3353.0ush
Site:	Lobo Blanco 8 Fed	MD Reference:	KB = 25 @ 3353.0ush
Well:	#704H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000.14

Survey											
MD (ush)	Inc (°)	Adj (grid north, azim)	TVD (ush)	N/S (ush)	E/W (ush)	DLeg (°/100ush)	BuBd (°/100ush)	Turn (°/100ush)	High to Plan (ush)	Right to Plan (ush)	
0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.00	0.00	0.0	0.0
132.0	0.40	192.10	132.0	-0.5	-0.1	0.30	0.30	0.00	-0.5	0.0	
308.0	0.50	335.10	308.0	-0.4	-0.5	0.48	0.08	81.25	0.1	0.8	
485.0	0.80	284.30	485.0	0.8	-1.8	0.27	0.06	-28.70	-1.8	-0.1	
667.0	1.30	287.30	667.0	1.4	-4.7	0.39	0.38	1.65	-4.9	0.0	
788.0	1.50	285.40	787.9	2.3	-7.5	0.17	0.17	-1.57	-7.8	-0.2	
957.0	1.20	288.80	858.9	3.4	-11.3	0.18	-0.18	2.01	-11.8	0.4	
1,146.0	1.30	284.20	1,145.8	4.6	-15.3	0.07	0.05	-2.43	-15.9	-0.7	
1,336.0	4.10	112.80	1,335.7	2.5	-11.1	2.84	1.47	-80.18	13.5	-2.4	
1,526.0	9.50	108.10	1,524.3	-5.1	10.1	2.88	2.84	-2.53	5.0	-2.8	
1,716.0	7.80	103.50	1,712.1	-12.9	37.5	0.97	-0.89	-2.42	2.7	-2.9	
1,905.0	8.10	103.00	1,899.1	-19.3	64.8	0.69	0.69	-0.28	4.5	-2.1	
2,094.0	10.00	103.30	2,085.5	-26.4	95.1	0.48	0.48	0.16	2.8	-1.3	
2,283.0	10.30	104.30	2,271.5	-34.4	127.4	0.18	0.18	0.53	-1.2	-0.8	
2,472.0	10.50	103.60	2,457.4	-42.6	160.5	0.13	0.11	-0.37	-5.8	-0.4	
2,662.0	10.60	104.00	2,844.2	-50.9	194.3	0.07	0.05	0.21	-11.0	0.2	
2,852.0	10.50	99.80	2,831.0	-58.0	228.4	0.43	-0.05	-2.32	-18.2	0.7	
3,041.0	11.60	84.50	3,016.5	-62.4	264.3	0.78	0.58	-2.70	-23.3	3.0	
3,231.0	10.50	108.10	3,203.0	-68.7	300.0	1.30	-0.58	6.11	-28.7	10.7	
3,421.0	10.00	97.90	3,389.9	-75.8	332.9	0.81	-0.28	-4.32	-34.1	7.8	
3,611.0	11.30	104.60	3,578.7	-82.7	367.3	0.94	0.68	3.53	-38.4	13.5	
3,801.0	12.30	92.30	3,762.7	-88.2	405.5	1.42	0.53	-6.47	-50.0	7.8	
3,990.0	11.30	100.50	3,947.7	-92.4	443.8	1.03	-0.53	4.34	-57.5	18.8	
4,181.0	8.40	111.60	4,135.9	-101.0	475.2	1.81	-1.32	5.81	-55.5	30.2	
4,371.0	8.10	111.20	4,323.7	-111.5	502.2	0.37	0.37	-0.21	-55.0	28.4	
4,561.0	8.10	111.00	4,511.5	-121.7	528.7	0.53	-0.53	-0.11	-54.0	23.0	
4,751.0	8.50	104.00	4,899.3	-130.3	558.4	0.93	0.74	-3.68	-55.8	15.1	



Final PVA Report

Company:	EOG Resources - Midland	Local Co-ordinate Reference:	Well #704H
Project:	Lea County, NM (NAD 83 NME)	TVD Reference:	KB = 25 @ 3393.0ush
Site:	Lobo Blanco 9 Fed	MD Reference:	KB = 25 @ 3393.0ush
Well:	#704H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000.14

MD (ush)	Inc (°)	Asl (grid_north Asm)	TVD (ush)	N/S (ush)	E/W (ush)	DLog (°/100ush)	Build (°/100ush)	Turn (°/100ush)	High to Plan (ush)	Right to Plan (ush)
4,841.0	10.20	104.00	4,888.5	-138.2	587.9	0.37	0.37	0.00	-50.4	15.5
5,131.0	11.50	111.30	5,073.1	-149.1	621.9	0.89	0.88	3.84	-62.2	21.4
5,321.0	9.80	112.40	5,259.9	-162.0	654.2	1.01	-1.00	0.58	-67.2	19.0
5,511.0	8.00	110.40	5,447.6	-172.7	681.2	0.88	-0.84	-1.05	-67.3	13.2
5,701.0	8.20	105.20	5,635.8	-180.9	706.7	0.40	0.11	-2.74	-65.2	8.7
5,891.0	8.10	101.50	5,823.8	-187.1	732.8	0.28	-0.05	-1.95	-62.7	2.4
6,081.0	8.30	100.80	6,011.9	-192.3	759.5	0.12	0.11	-0.37	-60.1	3.5
6,271.0	8.70	99.80	6,199.8	-197.3	787.1	0.22	0.21	-0.53	-58.8	4.8
6,461.0	8.70	104.80	6,387.6	-203.4	815.2	0.37	0.00	2.47	-57.0	10.9
6,650.0	8.90	104.30	6,574.4	-210.6	843.2	0.11	0.11	-0.11	-56.4	10.8
6,841.0	8.80	101.80	6,763.1	-217.2	871.8	0.21	-0.05	-1.31	-56.4	9.3
7,029.0	8.90	99.20	6,948.9	-222.5	900.2	0.22	0.05	-1.38	-56.4	9.0
7,219.0	7.90	102.80	7,138.8	-227.7	927.5	0.69	-0.53	1.89	-53.7	14.4
7,409.0	7.30	99.50	7,325.2	-232.6	952.1	0.39	-0.32	-1.74	-49.9	13.3
7,599.0	5.50	100.90	7,514.0	-238.3	973.0	0.95	-0.95	0.74	-41.1	16.8
7,789.0	3.50	141.80	7,703.4	-242.6	985.5	1.93	-1.05	21.59	-10.9	26.0
7,979.0	2.10	186.30	7,893.2	-250.5	998.1	1.50	-0.74	28.83	10.0	14.5
8,169.0	2.10	188.30	8,083.1	-257.2	989.0	0.04	0.00	1.05	3.3	10.5
8,358.0	0.60	319.10	8,272.1	-259.7	984.3	1.30	-0.79	63.92	8.1	-5.3
8,549.0	0.60	257.10	8,463.1	-259.2	982.7	0.32	0.00	-32.46	7.0	3.8
8,739.0	0.40	238.80	8,653.1	-259.7	981.1	0.13	-0.11	-9.63	3.8	5.9
8,929.0	0.50	239.50	8,843.0	-260.5	979.8	0.05	0.05	0.37	2.4	8.5
9,119.0	0.70	219.80	9,033.0	-261.8	978.4	0.15	0.11	-10.37	-1.5	8.7
9,309.0	1.00	222.40	9,223.0	-263.9	978.5	0.16	0.16	1.37	-4.1	5.6
9,499.0	0.90	218.30	9,413.0	-268.3	974.5	0.06	-0.05	-2.16	-7.8	5.4
9,689.0	0.80	208.10	9,603.0	-268.7	972.9	0.10	-0.05	-5.37	-11.3	3.7
9,879.0	0.50	185.10	9,793.0	-270.8	972.5	0.29	-0.18	-22.83	-12.5	-5.9



Final PVA Report

Company:	EOG Resources - Midland	Local Co-ordinate Reference:	Well #704H
Project:	Lea County, NM (NAD 83 NNE)	TVD Reference:	KB = 25 @ 3363.0usft
Site:	Lebo Blanco 9 Fed	MD Reference:	KB = 25 @ 3363.0usft
Well:	#704H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000.14

MD (usft)	Inc (°)	Azi (grid_north_azim)	TVD (usft)	NIS (usft)	ENW (usft)	Diag (°/100usft)	Buile (°/100usft)	Turn (°/100usft)	High to Plan (usft)	Right to Plan (usft)
10,069.0	0.70	69.10	9,982.9	-271.8	973.9	0.36	0.11	-34.74	-1.2	-14.6
10,259.0	0.10	20.50	10,172.9	-271.8	975.1	0.36	-0.32	-41.37	13.7	-5.2
10,449.0	1.70	347.30	10,362.9	-268.7	974.5	0.85	0.84	-17.47	11.3	3.1
10,639.0	2.50	335.00	10,552.9	-262.2	972.1	0.48	0.42	-6.47	3.5	4.8
10,828.0	0.80	314.10	10,741.7	-257.5	969.3	0.89	-0.85	-11.06	-3.7	4.3
11,018.0	1.30	278.70	10,931.7	-256.1	968.1	0.41	0.21	-18.63	-8.9	0.4
11,208.0	0.30	251.80	11,121.6	-255.9	963.5	0.55	-0.53	-14.16	-10.6	-4.6
11,398.0	1.80	199.00	11,311.6	-258.9	962.1	0.89	0.79	-27.79	-8.0	-11.6
11,588.0	0.70	284.40	11,501.6	-261.2	960.1	1.05	-0.58	50.21	-11.9	10.0
11,777.0	0.90	275.00	11,690.6	-260.6	957.5	0.18	0.11	-10.26	-17.1	5.1
11,964.0	1.20	238.70	11,757.5	-261.0	956.4	1.06	0.45	-54.18	-17.9	-6.3
12,007.0	2.80	211.30	11,920.4	-263.2	952.9	1.12	0.98	-16.81	-18.5	-14.6
12,198.0	2.20	210.90	12,111.3	-272.4	948.6	0.31	-0.31	-0.21	-26.8	-14.6
12,294.0	1.80	235.70	12,207.2	-274.8	948.4	0.98	-0.42	25.63	-33.7	-1.4
12,341.0	1.00	303.40	12,254.2	-275.0	945.4	3.81	-1.70	144.04	-14.8	31.3
12,389.0	1.50	352.80	12,302.2	-274.1	945.0	2.37	1.04	102.82	13.2	31.9
12,404.2	1.56	329.79	12,317.4	-273.8	944.9	4.04	0.42	-151.26	-0.7	34.5
KOP (LB 9 Fed #704H)										
12,436.0	2.30	297.60	12,349.2	-273.1	944.1	4.04	2.32	-101.27	-19.4	29.9
12,484.0	7.00	339.00	12,397.0	-269.9	942.2	11.43	9.79	86.25	6.4	37.5
12,531.0	16.90	359.40	12,442.9	-260.4	941.1	22.58	21.06	43.40	19.1	34.0
12,579.0	25.80	6.00	12,487.6	-243.0	942.1	19.16	18.54	13.75	19.2	31.0
12,626.0	30.30	8.20	12,529.1	-221.1	944.9	9.82	9.57	4.68	15.7	28.0
12,633.7	31.04	8.32	12,535.7	-217.2	945.4	9.62	9.58	1.82	15.1	27.5
HL Crossing MD:12833.7, TVD:12535.7, NIS:-217.2, ENW:948.4, DNC:31.04										
12,674.0	34.90	8.90	12,569.5	-195.5	948.7	9.62	9.58	1.43	12.1	24.3
12,721.0	41.00	6.20	12,606.5	-168.9	952.5	13.45	12.88	-5.74	7.5	21.2



Final PVA Report

Company: EOG Resources - Midland		Local Co-ordinates Reference		Well #704H	
Project: Lea County, NM (NAD 83 NME)		TVD Reference: KB		KB = 25 @ 3363.0usft	
Site: Lobo Blanco 9 Fed		MD Reference: KB		KB = 25 @ 3363.0usft	
Well: 0704H		North Reference: Grid		Grid	
Wellbore: OH		Survey Calculation Method: Minimum Curvature		Minimum Curvature	
Design: OH		Database: EDM 5000.14		EDM 5000.14	

MD (usft)	Inc (")	Azi (grid north azim)	TVD (usft)	NIS (usft)	EW (usft)	DLeg (°/100usft)	Sdld (°/100usft)	Turn (°/100usft)	High to Plan (usft)	Right to Plan (usft)
12,769.0	49.40	2.80	12,840.3	-132.9	955.1	18.20	17.50	-7.08	1.7	18.8
12,786.0	53.36	1.90	12,857.2	-111.8	955.9	14.90	14.87	-3.31	-2.0	17.9
FTP (LBS 9 Fed 0704H)										
12,816.0	58.30	1.30	12,868.7	-95.5	858.4	14.90	14.69	-3.03	-4.8	17.3
12,864.0	61.10	0.90	12,893.6	-84.5	957.2	10.03	10.00	-0.63	-11.4	16.3
12,911.0	63.30	1.90	12,715.6	-13.0	858.2	5.04	4.68	2.13	-15.9	15.0
12,959.0	65.70	1.20	12,736.2	30.3	859.4	5.17	5.00	-1.46	-17.6	13.3
13,006.0	74.10	2.40	12,752.4	74.4	960.7	18.03	17.87	2.55	-18.7	11.6
13,054.0	81.70	3.00	12,782.4	121.3	963.0	15.88	15.83	1.25	-21.8	9.0
13,101.0	81.50	1.60	12,769.3	167.7	964.8	2.98	-0.43	-2.88	-22.7	8.6
13,149.0	80.40	0.90	12,778.8	215.1	963.9	2.71	-2.29	-1.46	-18.2	5.1
13,244.0	89.20	1.30	12,785.4	309.8	967.7	9.27	9.26	0.42	-8.8	2.4
13,339.0	89.50	0.20	12,788.5	404.6	968.9	1.20	0.32	-1.16	-8.8	0.3
13,434.0	88.80	0.30	12,789.5	469.5	969.3	2.74	-2.74	0.11	-2.9	-1.0
13,529.0	89.10	0.00	12,792.8	594.5	969.8	2.34	2.32	-0.32	1.3	-2.0
13,624.0	90.10	0.60	12,793.5	689.6	970.1	1.23	1.05	0.63	2.8	-3.4
13,718.0	90.70	1.60	12,792.8	783.4	972.1	1.43	0.64	1.28	3.1	-6.2
13,814.0	90.50	0.90	12,791.8	879.4	974.3	0.96	-0.21	-0.94	3.0	-9.3
13,909.0	88.10	359.00	12,793.0	974.4	974.2	3.22	-2.53	-2.00	5.1	-10.0
14,004.0	88.00	358.60	12,796.2	1,069.3	972.2	0.43	-0.11	-0.42	9.2	-8.8
14,043.0	88.20	358.80	12,797.5	1,108.3	971.4	0.92	0.31	0.77	10.8	-8.3
14,138.0	88.10	359.30	12,800.6	1,203.2	969.9	0.43	-0.11	0.42	14.8	-7.7
14,233.0	88.30	359.50	12,803.6	1,288.2	968.9	0.30	0.21	0.21	18.7	-7.5
14,328.0	91.70	359.50	12,803.6	1,393.1	968.1	3.68	3.58	0.00	19.6	-7.6
14,423.0	89.70	359.70	12,801.8	1,488.1	967.4	1.07	-1.05	0.21	18.5	-7.7
14,518.0	89.60	359.80	12,801.3	1,583.1	968.8	1.16	-1.16	-0.11	19.2	-7.9
14,614.0	88.50	1.00	12,802.9	1,678.1	967.3	1.85	-1.15	1.46	21.7	-8.3



Final PVA Report

Company:	EOG Resources - Midland	Local Co-ordinate Reference:	Well #704H
Project:	Lea County, NM (NAD 83 NME)	TVD Reference:	KB = 25 @ 3363.0ush
Site:	Lobo Blanco 8 Fed	MD Reference:	KB = 25 @ 3363.0ush
Well:	#704H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000.14

Survey											
MD (ush)	Incl (°)	Adj. (grid, north, azim)	TVD (ush)	N/S (ush)	E/W (ush)	DLeg (°/100ush)	Build (°/100ush)	Turn (°/100ush)	High to Plan (ush)	Right to Plan (ush)	
14,708.0	80.30	0.90	12,803.9	1,773.1	988.9	1.92	1.91	-0.11	23.6	-11.6	
14,803.0	81.80	1.60	12,802.1	1,868.0	971.0	1.74	1.58	0.74	22.7	-14.5	
14,888.0	80.70	1.60	12,800.1	1,963.0	973.6	1.16	-1.16	0.00	21.6	-18.0	
14,993.0	82.10	1.30	12,797.8	2,057.8	976.0	1.51	1.47	-0.32	20.1	-21.3	
15,088.0	91.00	0.80	12,795.2	2,152.9	977.8	1.27	-1.16	-0.53	18.5	-23.8	
15,183.0	80.00	359.00	12,794.4	2,247.9	977.6	2.17	-1.05	-1.89	16.6	-24.5	
15,278.0	91.90	358.90	12,792.8	2,342.8	975.9	2.00	2.00	-0.11	17.9	-23.6	
15,373.0	88.50	357.80	12,792.5	2,437.8	973.1	3.76	-3.58	-1.16	18.4	-21.7	
15,468.0	89.50	359.40	12,794.1	2,532.7	970.8	1.98	1.05	1.68	21.0	-20.2	
15,563.0	88.20	356.50	12,787.7	2,627.6	967.4	4.62	-3.47	-3.05	25.5	-17.6	
15,658.0	83.90	355.00	12,805.9	2,721.8	960.4	2.89	-2.42	-1.58	34.5	-11.5	
15,753.0	87.10	354.20	12,813.3	2,816.2	951.5	3.47	3.37	-0.84	42.9	-3.4	
15,848.0	91.30	356.60	12,814.8	2,910.9	943.9	5.09	4.42	2.53	45.1	3.4	
15,943.0	88.00	356.60	12,815.2	3,005.7	938.2	3.47	-3.47	0.00	48.6	8.2	
16,038.0	89.80	358.00	12,817.1	3,101.6	933.7	2.38	1.87	1.48	49.4	11.9	
16,134.0	88.70	0.10	12,818.3	3,196.5	932.1	2.50	-1.16	2.21	51.5	12.7	
16,229.0	89.90	0.20	12,819.5	3,291.5	932.4	1.27	1.26	0.11	53.6	11.6	
16,324.0	87.40	0.90	12,813.4	3,386.3	933.3	7.93	7.89	0.74	48.4	9.9	
16,402.0	99.40	1.10	12,802.0	3,463.4	934.6	2.58	2.56	0.26	37.8	7.9	
16,434.4	97.68	1.27	12,797.2	3,495.5	935.3	5.39	-5.37	0.53	33.3	6.9	
TOT 1 (L.B. 8 Fed #704H)											
16,497.0	94.30	1.60	12,790.7	3,557.7	936.9	5.39	-5.37	0.52	27.4	4.8	
16,592.0	90.80	0.60	12,786.5	3,652.5	938.6	3.88	-3.68	-1.19	24.1	2.2	
16,687.0	90.20	0.60	12,785.7	3,747.5	939.5	0.64	-0.63	0.11	24.2	0.5	
16,782.0	87.30	0.30	12,787.6	3,842.5	940.3	2.88	-2.84	-0.32	27.0	-1.1	
16,877.0	87.20	359.30	12,792.0	3,937.4	939.9	1.10	-0.32	-1.05	32.4	-1.8	
16,972.0	87.10	359.00	12,796.7	4,032.3	938.5	0.33	-0.11	-0.32	38.0	-1.0	



Final PVA Report

Company: EOG Resources - Midland		Local Coordinate Reference:		Well #704H	
Project: Lea County, NM (NAD 83 NME)		TVD Reference:		KB = 25 @ 3363.0'ash	
Site: Lobo Blanco 9 Fed		MD Reference:		KB = 25 @ 3363.0'ash	
Well: #704H		North Reference:		Grid	
Wellbore: OH		Survey Calculation Method:		Minimum Curvature	
Design: OH		Database:		EDM 5000.14	

MD (ash)	Inc (°)	Azi (grid north azim)	TVD (ash)	N/S (ash)	E/W (ash)	DLog (°/100ash)	Bull'd (°/100ash)	Turn (°/100ash)	High to Plan (ash)	Right to Plan (ash)
17,088.0	80.20	0.10	12,798.9	4,128.2	937.8	3.43	3.23	1.15	41.2	-1.1
17,162.0	80.00	1.10	12,798.8	4,222.2	938.8	1.08	-0.21	1.08	42.0	-2.9
17,258.0	88.70	2.40	12,799.9	4,318.2	941.7	1.91	-1.35	1.35	44.1	-6.7
17,352.0	88.00	1.80	12,802.6	4,412.1	945.0	1.13	-0.74	-0.85	47.7	-10.8
17,447.0	89.10	0.30	12,805.0	4,507.0	948.5	1.79	1.16	-1.37	51.0	-13.2
17,542.0	87.20	0.60	12,808.0	4,602.0	947.3	2.02	-2.00	0.32	55.0	-14.8
17,638.0	93.10	3.00	12,807.8	4,695.9	950.2	6.78	6.28	2.55	53.7	-18.5
17,731.0	87.60	359.50	12,807.2	4,790.8	952.3	8.86	-5.79	-3.68	58.1	-21.5
17,828.0	80.40	358.70	12,808.9	4,885.8	950.8	3.07	2.85	-0.84	58.7	-20.8
17,921.0	91.30	358.60	12,807.5	4,980.7	948.8	0.95	0.85	-0.11	58.2	-18.4
18,018.0	80.80	358.00	12,805.7	5,075.7	945.8	0.82	-0.53	-0.63	57.4	-17.4
18,111.0	91.20	358.30	12,804.1	5,170.6	942.7	0.53	0.42	0.32	56.7	-15.2
18,206.0	91.60	359.10	12,801.7	5,265.5	940.5	0.94	0.42	0.84	55.3	-13.9
18,300.0	80.50	359.00	12,800.0	5,359.5	939.0	1.18	-1.17	-0.11	54.5	-13.1
18,395.0	92.80	358.90	12,797.2	5,454.4	937.2	2.63	2.53	-0.11	52.8	-12.2
18,454.1	93.27	359.34	12,794.0	5,513.5	936.3	0.97	0.83	0.74	50.0	-11.8
Tot. 2 (LB 9 Fed #704H)										
18,499.0	93.50	359.60	12,791.9	5,549.3	938.0	0.87	0.83	0.74	48.4	-11.8
18,585.0	91.40	358.00	12,787.8	5,644.2	934.0	2.78	-2.21	-1.68	45.7	-10.8
18,681.0	80.90	357.00	12,785.9	5,740.1	929.8	1.16	-0.52	-1.04	45.2	-7.3
18,776.0	91.20	356.60	12,784.2	5,834.9	924.5	0.53	0.32	-0.42	44.9	-2.8
18,871.0	90.50	356.60	12,782.8	5,929.7	918.9	0.74	-0.74	0.00	44.8	2.0
18,965.0	90.80	356.80	12,781.9	6,023.6	914.9	2.02	0.11	2.02	45.3	6.2
19,060.0	88.50	358.60	12,782.6	6,118.6	912.5	2.21	-2.21	0.11	47.4	8.8
19,156.0	88.20	358.00	12,785.4	6,214.5	909.6	0.70	-0.31	-0.62	51.8	8.8
19,250.0	88.80	358.10	12,787.8	6,308.4	908.4	0.85	0.84	0.11	55.4	11.1
19,346.0	87.60	357.60	12,790.8	6,404.3	903.0	1.29	-1.25	-0.31	58.8	13.7



Final PVA Report

Company:	EOG Resources - Midland	Local Co-ordinate Reference:	Well #7704H
Project:	Lea County, NM (NAD 83 NME)	TVD Reference:	KB = 25 @ 3383.0usft
Site:	Lobo Blanco 9 Fed	MD Reference:	KB = 25 @ 3383.0usft
Well:	#7704H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	COM 5000.14

MD (usft)	Inc (")	Asd (grid north Azim)	TVD (usft)	NS (usft)	EW (usft)	DLeg (°/100usft)	Bulld (°/100usft)	Turn (°/100usft)	High to Plan (usft)	Right to Plan (usft)
19,441.0	89.70	357.90	12,783.1	6,499.2	899.4	2.21	2.21	0.11	63.4	18.4
19,538.0	91.30	358.70	12,792.3	6,594.2	898.6	1.88	1.88	0.84	64.0	18.4
19,632.0	93.40	1.10	12,788.3	6,690.1	896.4	3.32	2.19	2.50	61.4	17.8
19,727.0	93.70	0.70	12,782.4	6,784.9	897.9	0.53	0.32	-0.42	56.9	15.5
19,822.0	91.60	1.60	12,778.0	6,879.7	899.8	2.40	-2.21	0.95	53.9	12.8
19,830.8	91.60	1.53	12,777.8	6,888.6	900.1	0.84	0.00	-0.84	53.8	12.4
TOT 3 (LB 8 Fed #7704H)										
19,917.0	91.60	0.80	12,775.4	6,974.7	901.8	0.84	0.00	-0.84	52.8	9.9
20,012.0	90.70	0.10	12,773.5	7,069.7	902.8	1.20	-0.95	-0.74	51.9	9.3
20,107.0	90.00	359.40	12,772.9	7,164.7	902.2	1.04	-0.74	-0.74	52.7	7.8
20,202.0	89.50	358.50	12,773.3	7,259.6	900.4	1.08	-0.53	-0.95	54.3	8.8
20,297.0	91.80	359.20	12,772.2	7,354.6	898.5	2.53	2.42	0.74	54.8	9.9
20,392.0	92.30	359.10	12,768.8	7,449.5	897.1	0.54	0.53	-0.11	52.4	10.5
20,487.0	90.50	357.60	12,768.5	7,544.5	894.4	2.47	-1.89	-1.58	51.4	12.4
20,582.0	90.80	0.00	12,765.4	7,639.4	892.4	2.58	0.42	2.53	51.5	13.6
20,677.0	90.80	1.60	12,763.9	7,734.4	893.7	1.68	0.00	1.68	51.3	11.4
20,772.0	91.30	1.40	12,762.0	7,829.4	898.2	0.47	0.42	-0.21	50.8	8.1
20,867.0	91.50	1.00	12,759.7	7,924.3	898.2	0.47	0.21	-0.42	49.7	6.3
20,962.0	91.00	1.10	12,757.7	8,019.3	899.9	0.54	-0.53	0.11	48.9	2.7
21,057.0	90.20	0.90	12,756.7	8,114.2	901.8	0.87	-0.84	-0.21	49.2	0.2
21,152.0	90.20	1.60	12,756.3	8,209.2	903.6	0.74	0.00	0.74	50.2	-2.7
21,247.0	89.70	1.80	12,756.4	8,304.2	906.5	0.57	-0.53	0.21	51.5	-6.3
21,342.0	92.40	0.40	12,754.7	8,399.1	908.3	3.20	-2.84	-1.47	51.1	-9.0
21,437.0	93.00	0.30	12,750.2	8,494.0	908.9	0.64	0.63	-0.11	47.9	-10.4
21,532.0	93.20	359.50	12,745.1	8,588.9	908.7	0.87	0.21	-0.84	44.0	-11.1
21,627.0	92.60	359.20	12,740.2	8,683.8	907.6	0.71	-0.63	-0.32	40.6	-10.8
21,722.0	93.80	359.80	12,734.9	8,778.6	906.8	1.41	1.28	0.63	38.6	-10.8



Final PVA Report

Company:	EOG Resources - Midland	Local Co-ordinate Reference:	Well #704H
Project:	Lea County, NM (NAD 83 NME)	TVD Reference:	KB = 25 @ 3363.0usft
Site:	Lobo Blanco 9 Fed	MD Reference:	KB = 25 @ 3363.0usft
Well:	#704H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000.14'

MD (usft)	Inc (")	Azi (grid north azim)	TVD (usft)	N/S (usft)	E/W (usft)	DLog ("/100usft)	Build ("/100usft)	Turn ("/100usft)	High to Plan (usft)	Right to Plan (usft)
21,817.0	91.40	0.10	12,730.6	8,873.5	906.7	2.55	-2.53	0.32	33.4	-11.8
21,912.0	91.40	359.20	12,728.3	8,968.5	908.1	0.95	0.00	-0.85	32.4	-11.8
22,008.0	69.80	359.30	12,727.3	9,064.5	904.9	1.67	-1.67	0.10	32.7	-11.4
22,054.2	69.26	359.01	12,727.7	9,110.7	904.2	1.32	-1.18	-0.63	33.7	-11.1
TOT 4 (LB 9 Fed #704H)										
22,103.0	68.70	358.70	12,728.6	9,158.4	903.2	1.32	-1.18	-0.63	35.0	-10.6
22,188.0	91.10	359.70	12,728.7	9,254.4	901.9	2.74	2.53	1.65	36.1	-10.1
22,293.0	92.50	0.50	12,725.7	9,349.4	902.1	1.70	1.47	0.84	34.1	-11.1
22,388.0	92.60	0.80	12,721.6	9,444.3	903.1	0.33	0.11	0.32	30.8	-13.0
22,483.0	94.10	0.50	12,716.0	9,539.1	904.2	1.61	1.58	-0.32	28.1	-14.9
22,578.0	91.30	359.20	12,711.5	9,634.0	904.0	3.25	-2.95	-1.37	22.6	-15.5
22,681.0	68.70	357.10	12,711.5	9,738.9	900.6	3.24	-2.52	-2.04	23.6	-13.1
22,776.0	67.10	354.80	12,715.0	9,831.6	893.9	2.95	-1.68	-2.42	28.0	-7.2
22,871.0	67.00	355.10	12,719.9	9,928.1	885.6	0.33	-0.11	0.32	33.8	0.3
22,965.0	68.00	354.70	12,725.6	10,019.5	877.2	1.15	-1.06	-0.43	40.5	7.8
23,018.0	68.30	354.40	12,729.2	10,072.2	872.2	0.80	0.57	-0.57	44.6	12.4
Final MWD Survey (MD=23018.0)										
23,075.3	68.30	354.40	12,732.8	10,129.1	866.6	0.00	0.00	0.00	48.8	17.6
PBHL (LB 9 Fed #704H)										
23,078.0	68.30	354.40	12,733.0	10,131.8	868.4	0.00	0.00	0.00	49.0	17.7
Final Projection to BH (MD=23078.0)										



Final PVA Report

Company:	EOG Resources - Midland	Local Co-ordinate Reference:	Well #704H
Project:	Lee County, NM (MAD 83 NME)	TVD Reference:	KB = 25 @ 3363.0ust
Site:	Lobo Blanco 9 Fed	MD Reference:	KB = 25 @ 3363.0ust
Well:	#704H	North Reference:	Grid
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Databases:	EDM 5000.14

Design Annotations				
Measured Depth (ust)	Vertical Depth (ust)	Local Coordinates		Comment
		+N-S (ust)	+E-W (ust)	
12,633.7	12,535.7	-217.2	845.4	HL Crossing, MD:12633.7, TVD:12535.7, N/S:-217.2, E/W:845.4, INC:31.04
23,018.0	12,729.2	10,072.2	872.2	Final MWD Survey (MD=23018.0)
23,078.0	12,733.0	10,131.8	868.4	Final Projection to B ₀ (MD=23078.0)

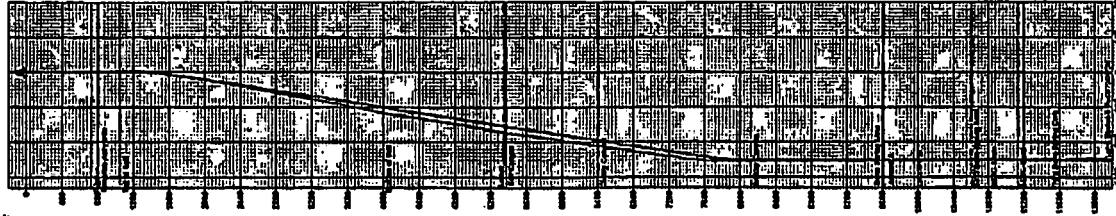
Checked By: _____ Approved By: _____ Date: _____

I certify this survey to be true and correct to the best of my belief and knowledge.

Krup Maddox 11/19/2019
Signed Date



Lea County, NM (NAD 83 NME)
Lobo Blanco 8 Fed #704H
Plan #1



Adjusted to Grid North
True North: 4.5°
Magnetic North: 4.5°
Magnetic Declination: 0.0°
Datum: NAD 83
Zone: 12N
Datum: NAD 83

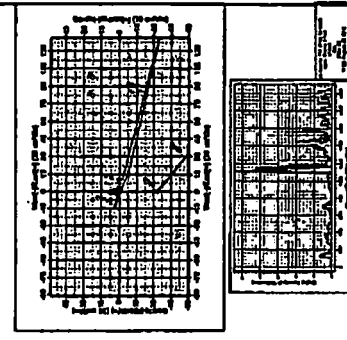
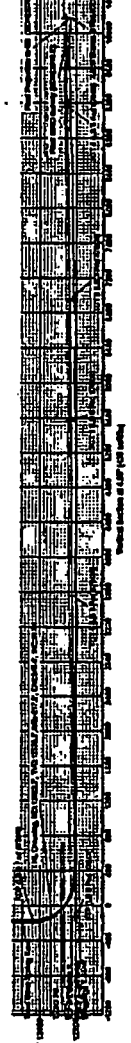
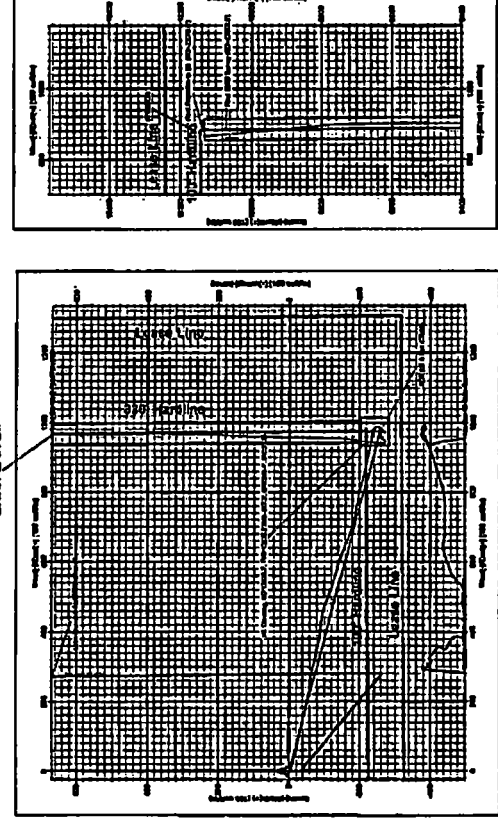
By: [Signature]
Title: [Title]
Date: [Date]

PROJECT DETAILS: Lea County, NM (NAD 83 NME)
Geographic System: US State Plane 1983
Datum: North American Datum 1983
Zone: 12N
Datum: NAD 83
Zone: 12N
Datum: NAD 83

WELL DETAILS: #704H
RD = 25 @ INCHES
Easting: 630712.0
Northing: 63311.0
Longitude: 107° 27' 43.00 W
Latitude: 33° 27' 43.00 N

SECTION DETAILS									
Sec	MD	Inc	Asd	TVD	W-C	W-C	W-C	W-C	Target
1	6.0	0.00	0.00	0.0	0.0	0.00	0.00	0.0	0.0
2	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
3	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
4	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
5	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
6	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
7	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
8	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
9	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
10	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
11	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
12	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
13	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
14	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
15	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
16	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0

WELLBORE LOG (DEPTH) (FEET) (FEET)									
Depth	MD	Inc	Asd	TVD	W-C	W-C	W-C	W-C	Target
0	6.0	0.00	0.00	0.0	0.0	0.00	0.00	0.0	0.0
1	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
2	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
3	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
4	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
5	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
6	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
7	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
8	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
9	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
10	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
11	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
12	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
13	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
14	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
15	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0
16	1181.8	0.00	0.00	1181.8	0.0	0.00	0.00	0.0	0.0





United States Department of the Interior

BUREAU OF LAND MANAGEMENT

Carlsbad Field Office
620 E. Greene St.
Carlsbad, NM 88220-6292



Notice of Change to Procedure – Please Read

To All Operators,

This is to notify you that the Bureau of Land Management (BLM) Carlsbad Field Office will no longer be supplying copies of sundries (3160-5), applications for permit to drill (APDs), or completion reports (3160-4) to the New Mexico Oil Conservation Division (NMOCD).

Effective immediately, to be in compliance with C-104 requirements, the NMOCD is requiring operators to submit a copy of any sundries, APDs, or completion reports processed by the BLM to the appropriate NMOCD office. This change will affect all BLM sundries, APDs, and completion reports in Eddy and Lea counties.

If a copy of a previously processed sundry, APD, or completion report is needed for submission to NMOCD, the Carlsbad Field Office will send a copy to the operator.

If you have any questions, please contact Jonathon Shepard (BLM) 575-234-2237.

Thank you

Note: This notice is being included in multiple communications from the BLM Carlsbad Field Office and you may receive multiple copies.