

State of New Mexico
Energy, Minerals and Natural Resources Department

Michelle Lujan Grisham
Governor

Sarah Cottrell Propst
Cabinet Secretary

Todd E. Leahy, JD, PhD
Deputy Secretary

Adrienne Sandoval, Division Director
Oil Conservation Division



4/16/2020

**Operator Notice Regarding
C-104 Denial and Request for Information**

OCD is providing notice to operators that it will deny your C-104 – *Request for Allowable and Authorization to Transport* if it fails to provide complete and accurate information, including:

Test Allowable, New Well and Recompleted Well

30-015-45305

****Amend C-104**

****Please see attached**

- ☐ C-103 (or BLM equivalent) for all casing strings
 - ☐ Spud Notice
 - ☐ Surface Casing
 - ☐ Intermediate Casing (if applicable)
 - ☐ Additional Intermediate Casing (if applicable)
 - ☐ Production Casing or Liner

☐ Applicable Order (NSL, NSP, Other _____)

☐ Deviation Survey for Vertical Wells

☒ Directional Survey

with

☒ C-102 (As-Drilled Plat for Horizontal Well)

New Well and Recompleted Well Only

☒ C-103 Completion Sundry (or BLM equivalent)

☒ C-105 Completion Report (or BLM equivalent) **-Amend**

☒ All Logs Run on Well

The sale or transport of product without an approved C-104 violates the Oil and Gas Act and the implementing rules, including 19.15.7.15 and 19.15.16.19 NMAC. If OCD determines that your C-104 is incomplete or inaccurate, it will give you notice to resubmit your C-104 within 30 days. Failure to comply with this notice may result in enforcement action.

If you have any questions, please contact the local OCD District Office.

Once Amended and complete, please electronically submit through

District I
1625 N. French Dr., Hobbs, NM 88240
District II
811 S. First St., Artesia, NM 88210
District III
1000 Rio Brazos Rd., Aztec, NM 87410
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico
Energy, Minerals & Natural Resources

Oil Conservation Division
1220 South St. Francis Dr.
Santa Fe, NM 87505

RECEIVED

FEB 05 2020

Submit one copy to appropriate District Office

EMNRD-OCDA ARTESIA

AMENDED REPORT

Form C-104
Revised August 1, 2011

I. REQUEST FOR ALLOWABLE AND AUTHORIZATION TO TRANSPORT

¹ Operator name and Address Cimarex Energy Co. 600 N. Marienfeld, Suite 600 Midland, Texas 79701		² OGRID Number 215099
		³ Reason for Filing Code/ Effective Date NW 09/07/19
⁴ API Number 30 - 015-45305	⁵ Pool Name Purple Sage; Wolfcamp (Gas)	⁶ Pool Code 98220
⁷ Property Code 322649	⁸ Property Name Riverboat 12-1 WOPA Federal Com	⁹ Well Number 001H

II. ¹⁰ Surface Location

UL or lot no. P	Section 12	Township 24S	Range 26E	Lot Idn	Feet from the 285	North/South Line South	Feet from the 449	East/West line East	County Eddy
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¹¹ Bottom Hole Location

UL or lot no. A	Section 1	Township 24S	Range 26E	Lot Idn	Feet from the 1345	North/South line North	Feet from the 369	East/West line East	County Eddy
¹² Lse Code F	¹³ Producing Method Code F	¹⁴ Gas Connection Date	¹⁵ C-129 Permit Number	¹⁶ C-129 Effective Date	¹⁷ C-129 Expiration Date				

III. Oil and Gas Transporters

¹⁸ Transporter OGRID	¹⁹ Transporter Name and Address	²⁰ O/G/W
21778	Sunoco R&M P.O. Box 2039 Tulsa, OK 74102	O
36785	DCP Midstream, LP 370 17 th Street, Suite 2500 Denver, CO 80202	G

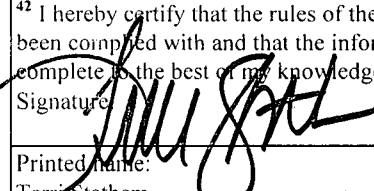
IV. Well Completion Data

²¹ Spud Date 01/02/2019	²² Ready Date 09/07/19	²³ TD 17637'	²⁴ PBTD 17593	²⁵ Perforations 9042-17568'	²⁶ DHC, MC
²⁷ Hole Size	²⁸ Casing & Tubing Size	²⁹ Depth Set	³⁰ Sacks Cement		
17 1/2"	13 3/8"	418'	600 SX		
12 1/4"	9 5/8"	1973'	800SX		
8 3/4"	5 1/2"	17596'	3780		

V. Well Test Data

³¹ Date New Oil 9/14/19	³² Gas Delivery Date 09/12/19	³³ Test Date 09/21/19	³⁴ Test Length 24 hrs	³⁵ Tbg. Pressure 0	³⁶ Csg. Pressure 1290
³⁷ Choke Size 36/64	³⁸ Oil 293	³⁹ Water 5999	⁴⁰ Gas 932		⁴¹ Test Method P

⁴² I hereby certify that the rules of the Oil Conservation Division have been complied with and that the information given above is true and complete to the best of my knowledge and belief.

Signature: 

Printed name:
Terri Stathem

Title:
Regulatory

E-mail Address:
tstathem@cimarex.com

Date:
12/21/2019

Phone:
432-6201936

OIL CONSERVATION DIVISION

Approved by:

Title:

Approval Date:

"Denied"

District I
6525 N. Francis Dr., Santa Fe, NM 87505
Phone: (505) 191-6051 Fax: (505) 191-6700
District II
811 N. First St., Artesia, NM 87003
Phone: (505) 748-1243 Fax: (505) 748-9700
District III
2584 N. Main Street, Aztec, NM 87410
Phone: (505) 194-6018 Fax: (505) 194-6000
District IV
1230 N. St. Francis Dr., Santa Fe, NM 87505
Phone: (505) 416-1450 Fax: (505) 416-3462

State of New Mexico
Energy, Minerals & Natural Resources Department
OIL CONSERVATION DIVISION
1220 South St. Francis Dr.
Santa Fe, NM 87505

RECEIVED

FEB 05 2020

Form C-102

Revised August 1, 2011

Submit one copy to appropriate

District Office

EMNRD-OCD ARTESIA

AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

1 AFN Number 30015-45305	2 Field Code 99220	3 Field Name Purple Sage Wolfcamp Gas
4 Property Code 322648	5 Property Name RIVERBOAT 12/1 WOPA FEDERAL COM	6 Well Number 1H
7 OCHRD NO. 215089	8 Operator Name CIMAREX ENERGY COMPANY	9 Elevation 3237'

10 Surface Location

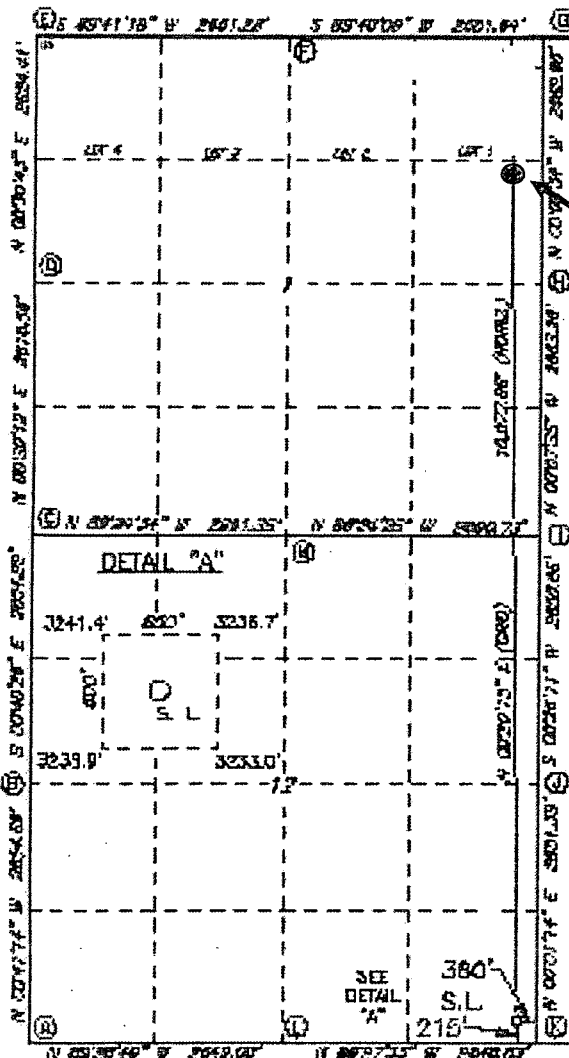
11. or 12th	Section	Township	Range	1st 1/4	Feet from the	North/South line	Feet from the	East/West line	County
P	12	24S	28E		215	SOUTH	380	EAST	EDDY

11 Bottom Hole Location If Different From Surface

11. or 12th	Section	Township	Range	1st 1/4	Feet from the	North/South line	Feet from the	East/West line	County
1	1	24S	28E		1354	NORTH	305	EAST	EDDY

12 Dedicated Acreage	13 Feet or 1/4th	14 Corner/Station Code	15 Corner 1/4th

No allowable will be assigned to this completion until all interest have been consolidated or a non-standard unit has been approved by the division.



DETAILED DATA
WAD 20 000 - NW 04ST
SURFACE LOCATION
T: 443333.3 - E: 570444.7
LAT: 36.2230778° N
LONG: 104.2212000° W

BHL: 1354' FNL & 305' FEL

13 OPERATOR CERTIFICATION

I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief, and that this organization either owns or is working for, or is an authorized agent of, the land including the proposed bottom hole location or (has a right to do so) and that the location provided is a correct and true center of such a wellbore or working interest, or an authorized pooling agreement or an existing pooling order having been approved by this division.

12/21/19

Signature: *[Signature]*
Name: TERRISTATHEM
Email: TSTATHEM@CIMAREX.COM
Address:

14 SURVEYOR CERTIFICATION

I hereby certify that the well location shown on this plat was obtained from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my belief.

10-19-2018

Date of Survey

Signature and Seal of Professional Surveyor

10034

10080

Certified True

REV. 7/28/18 S.L. B.H. MOVE

Job No.: LS18101188R

Intent ☐ As Drilled ☒

API #
30-015-45305

Operator Name: Cimarex Energy Co.	Property Name: Riverboat 12-1 WOPA Federal Com	Well Number 001H
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Kick Off Point (KOP)

UL D	Section 12	Township 24S	Range 26E	Lot	Feet 215	From N/S South	Feet 408	From E/W East	County Eddy
Latitude 332.225086					Longitude -104.239294			NAD 83	

First Take Point (FTP)

UL D	Section 12	Township 24S	Range 26E	Lot	Feet 682	From N/S South	Feet 306	From E/W East	County Eddy
Latitude 32.226369					Longitude -104.238964			NAD 83	

Last Take Point (LTP)

UL A	Section 1	Township 24S	Range 26E	Lot	Feet 1416	From N/S North	Feet 300	From E/W East	County Eddy
Latitude 32.233131					Longitude -104.238894			NAD 83	

Is this well the defining well for the Horizontal Spacing Unit? ☒

Is this well an infill well? ☐

If infill is yes please provide API if available, Operator Name and well number for Defining well for Horizontal Spacing Unit.

API #		
Operator Name:	Property Name:	Well Number

KZ 06/29/2018

Cimarex



Borehole:	Well:	Field:	Structure:
Original Borehole	Cimarex Riverboat 12-1 W0PA Fed Com 1H	NM Eddy County (NAD 83)	Cimarex Riverboat 12-1 W0PA Fed Com 1H

Gravity & Magnetic Parameters	Surface Location	NAD83 New Mexico 2011 Plane, Eastern Zone, US Feet	Measurements
Method: HDGM 2018	Lat: N 32 13 20.32	Wellbore: 44583.571US	Client: Cimarex Riverboat 12-1 W0PA Fed Com 1H
Magnetic: 7.55P	Long: W 104 14 21.14	Eastings: 87644.711US	Scale Factor: 0.0000
			Grid North: 0.0000
			Grid East: 0.0000
			Grid Conv: 0.0000

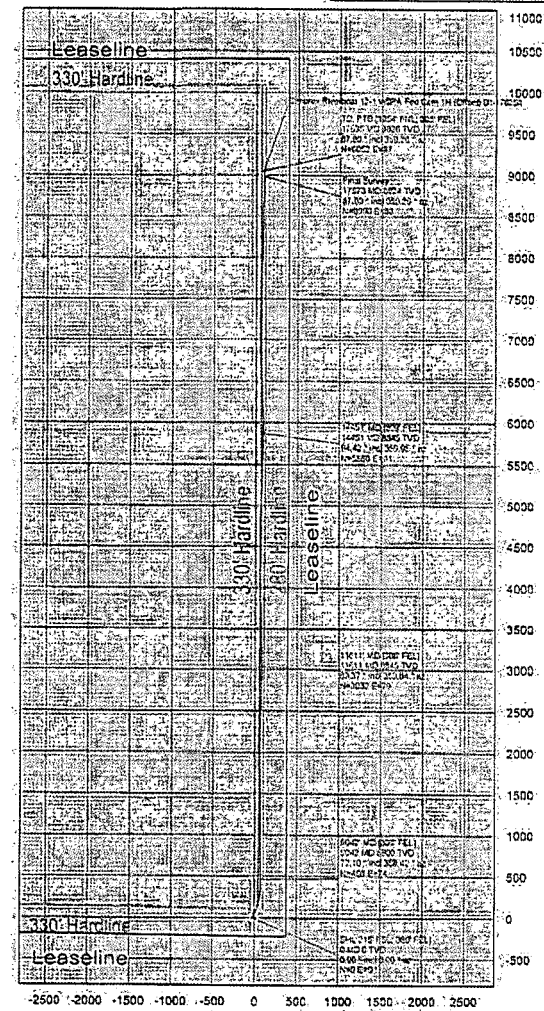
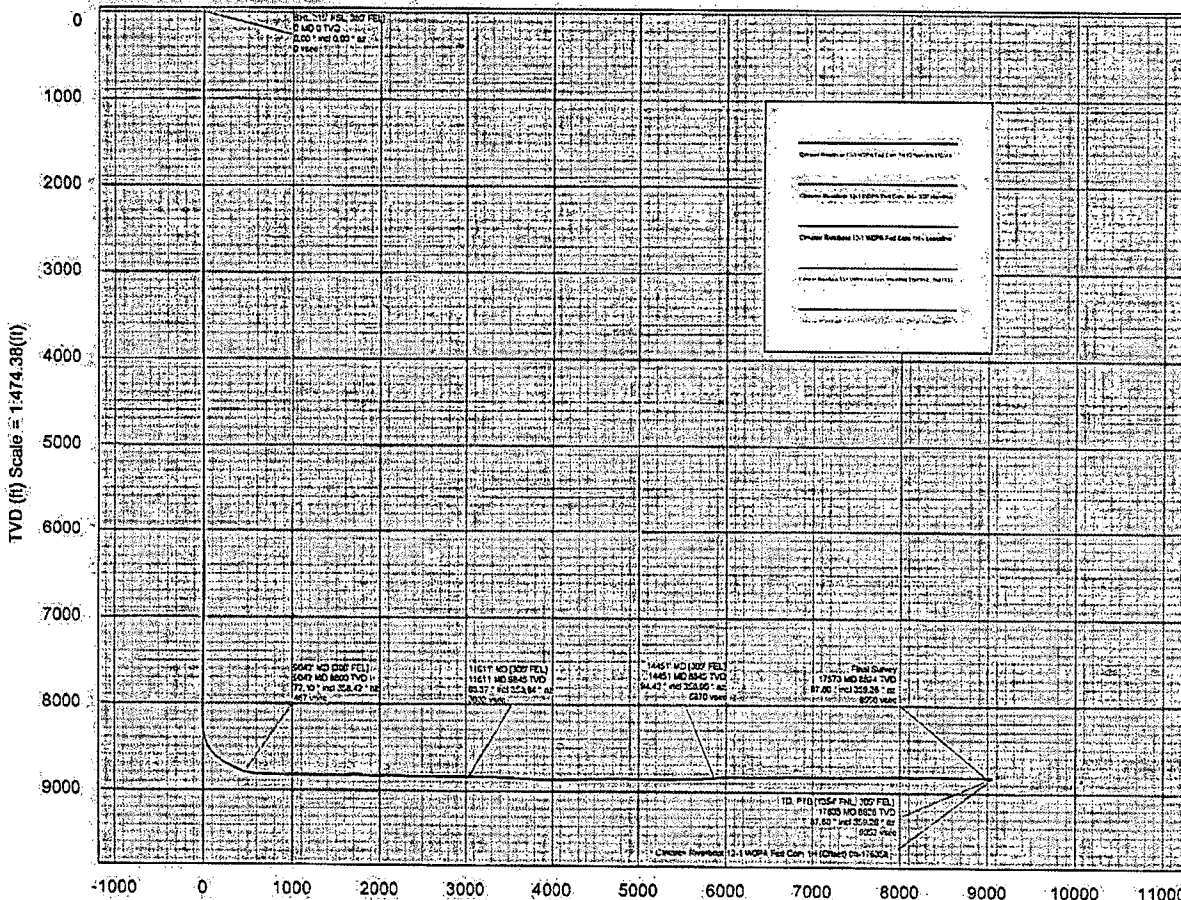
Critical Points								
Critical Point	MD	INCL	AZIM	TVD	VSOC	N(=)G(=)	E(=)W(=)	OLS
DBL 21P FEL 33P FEL	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
9047 MD (DOF FEL)	7042.00	72.10	358.42	8880.29	458.78	458.19	74.35	12.01
1181T MD (DOF FEL)	11811.00	89.37	359.84	8844.87	3032.04	3031.51	78.47	1.34
14451 MD (DOF FEL)	14451.00	94.42	359.96	8844.87	5809.37	5809.44	93.06	2.12
Final Survey	17573.00	87.80	358.28	8823.87	8090.28	8089.87	94.06	2.08
TD, PTH (128P FEL 33P FEL)	17628.00	87.80	358.28	8823.20	8090.22	8089.82	97.26	0.00



Grid
True
Map

Grid North
Tot Corr (M→G 7.209")
Mag Dec (7.255")
Grid Conv (0.050")

CONTROLLED	
Drawn by	
Checked by	
Date	
Scale	
Sheet	
Drawn by	
Checked by	
Date	
Scale	
Sheet	



Vertical Section (ft) Azim = 0.45° Scale = 1:474.38(ft) Origin = 0N/S, 0E/W

EW (ft) Scale = 1:497.36(ft)

Cimarex Riverboat 12-1 W0PA Fed Com 1H (Offset) 0ft-17635ft Survey Geodetic Report (Def Survey)



Report Date:	July 29, 2019 - 02:10 PM	Survey / DLS Computation:	Minimum Curvature / Lubinski
Client:	Cimarex	Vertical Section Azimuth:	0.451 ° (Grid North)
Field:	NM Eddy County (NAD 83)	Vertical Section Origin:	0:000 ft, 0:000 ft
Structure / Slot:	Cimarex Riverboat 12-1 W0PA Fed Com 1H / Cimarex Riverboat 12-1 W0PA Fed Com 1H	TVD Reference Datum:	RKB
Well:	Cimarex Riverboat 12-1 W0PA Fed Com 1H	TVD Reference Elevation:	3263.000 ft above MSL
Borehole:	Original Borehole	Seabed / Ground Elevation:	3237.000 ft above MSL
UWI / API#:	Unknown / Unknown	Magnetic Declination:	7.259 °
Survey Name:	Cimarex Riverboat 12-1 W0PA Fed Com 1H (Offset) 0ft-17635ft	Total Gravity Field Strength:	998.4513 mgn (9.80665 Based)
Survey Date:	July 26, 2019	Gravity Model:	GARM
Toit / AHD / DDI / ERD Ratio:	259.492 ° / 9223.902 ft / 6.677 / 1.039	Total Magnetic Field Strength:	47819.570 nT
Coordinate Reference System:	NAD83 New Mexico State Plane, Eastern Zone, US Feet	Magnetic Dip Angle:	59.881 °
Location Lat / Long:	N 32° 13' 30.31616", W 104° 14' 21.13751"	Declination Date:	July 26, 2019
Location Grid N/E Y/X:	N 445633:500 ftUS, E 570444:700 ftUS	Magnetic Declination Model:	HDGM 2019
CRS Grid Convergence Angle:	0.0502 °	North Reference:	Grid North
Grid Scale Factor:	0.99991006	Grid Convergence Used:	0.0502 °
Version / Patch:	2.10.760.0	Total Corr Mag North->Grid North:	7.2086 °
		Local Coord Referenced To:	Well Head

Comments	MD (ft)	Incl (°)	Azim Grid (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (N/S ° ' ")	Longitude (E/W ° ' ")
SHL 215' FSL 380' FEL	0.00	0.00	0.00	0.00	0.00	0.00	0.00	N/A	445633.50	570444.70	N 32 13 30.32	W 104 14 21.14
	199.00	0.73	82.54	198.99	0.59	0.58	1.12	0.37	445634.08	570445.82	N 32 13 30.32	W 104 14 21.12
	277.00	0.77	87.85	276.99	0.85	0.83	2.09	0.42	445634.33	570446.79	N 32 13 30.32	W 104 14 21.11
	483.00	0.99	113.88	482.96	0.20	0.16	5.10	0.22	445633.66	570449.80	N 32 13 30.32	W 104 14 21.08
	574.00	0.87	118.18	573.95	-0.43	-0.48	6.43	0.15	445633.02	570451.13	N 32 13 30.31	W 104 14 21.06
	666.00	1.13	115.75	665.94	-1.14	-1.20	7.86	0.29	445632.30	570452.56	N 32 13 30.30	W 104 14 21.05
	756.00	1.11	111.96	755.92	-1.84	-1.92	9.47	0.09	445631.59	570454.17	N 32 13 30.30	W 104 14 21.03
	845.00	1.20	111.06	844.90	-2.48	-2.57	11.14	0.10	445630.93	570455.84	N 32 13 30.29	W 104 14 21.01
	940.00	1.01	97.90	939.89	-2.94	-3.04	12.90	0.33	445630.46	570457.59	N 32 13 30.29	W 104 14 20.99
	1034.00	0.39	106.70	1033.88	-3.14	-3.25	14.02	0.67	445630.25	570458.72	N 32 13 30.28	W 104 14 20.97
	1129.00	0.26	187.18	1128.88	-3.44	-3.56	14.31	0.45	445629.94	570459.00	N 32 13 30.28	W 104 14 20.97
	1223.00	0.79	131.97	1222.87	-4.09	-4.20	14.76	0.72	445629.30	570459.46	N 32 13 30.27	W 104 14 20.97
	1317.00	2.32	117.80	1316.84	-5.39	-5.52	16.93	1.67	445627.98	570461.62	N 32 13 30.26	W 104 14 20.94
	1412.00	2.66	116.73	1411.75	-7.25	-7.41	20.59	0.36	445626.08	570465.29	N 32 13 30.24	W 104 14 20.90
	1507.00	0.77	245.87	1506.72	-8.49	-8.66	21.98	3.37	445624.84	570466.68	N 32 13 30.23	W 104 14 20.88
	1696.00	1.14	280.39	1695.69	-8.69	-8.84	18.97	0.35	445624.66	570463.67	N 32 13 30.23	W 104 14 20.92
	1790.00	1.43	279.88	1789.67	-8.34	-8.47	16.90	0.31	445625.03	570461.60	N 32 13 30.23	W 104 14 20.94
	1885.00	1.48	279.10	1884.64	-7.96	-8.08	14.52	0.06	445625.42	570459.22	N 32 13 30.24	W 104 14 20.97
	2064.00	1.65	282.83	2063.57	-7.06	-7.14	9.72	0.11	445626.36	570454.42	N 32 13 30.25	W 104 14 21.02
	2253.00	1.68	285.28	2252.49	-5.77	-5.80	4.40	0.04	445627.70	570449.10	N 32 13 30.26	W 104 14 21.09
	2348.00	1.66	285.62	2347.45	-5.05	-5.07	1.73	0.02	445628.43	570446.43	N 32 13 30.27	W 104 14 21.12
	2537.00	0.48	203.97	2536.42	-5.06	-5.05	-1.23	0.88	445628.45	570443.47	N 32 13 30.27	W 104 14 21.15
	2632.00	0.38	214.34	2631.42	-5.69	-5.68	-1.57	0.13	445627.82	570443.13	N 32 13 30.26	W 104 14 21.16
	2821.00	0.68	216.70	2820.41	-7.11	-7.09	-2.59	0.16	445626.41	570442.11	N 32 13 30.25	W 104 14 21.17
	2915.00	0.61	230.04	2914.40	-7.89	-7.86	-3.31	0.18	445625.64	570441.39	N 32 13 30.24	W 104 14 21.18
	3009.00	0.67	230.93	3008.40	-8.56	-8.53	-4.12	0.06	445624.97	570440.58	N 32 13 30.23	W 104 14 21.19

Comments	MD (ft)	Incl (°)	Azim Grid (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (N/S ° ' ")	Longitude (E/W ° ' ")
9042' MD [306' FEL]	8853.00	63.05	3.92	8721.89	295.06	294.52	70.56	12.68	445927.99	570515.25	N 32 13 33.23	W 104 14 20.31
	8900.00	63.43	3.03	8743.05	336.97	336.41	73.10	1.87	445969.88	570517.79	N 32 13 33.64	W 104 14 20.28
	8947.00	64.68	1.08	8763.62	379.21	378.64	74.61	4.58	446012.10	570519.30	N 32 13 34.06	W 104 14 20.27
	8995.00	66.20	359.93	8783.57	422.87	422.29	74.99	3.84	446055.75	570519.69	N 32 13 34.49	W 104 14 20.26
	9042.00	72.10	358.42	8800.29	466.76	466.19	74.35	12.91	446099.65	570519.04	N 32 13 34.93	W 104 14 20.27
	9089.00	78.56	358.81	8812.19	512.18	511.62	73.25	13.77	446145.07	570517.95	N 32 13 35.38	W 104 14 20.28
	9136.00	81.04	358.28	8820.51	558.41	557.86	72.08	5.39	446191.31	570516.77	N 32 13 35.84	W 104 14 20.29
	9184.00	85.03	358.33	8826.33	606.01	605.47	70.67	8.31	446238.92	570515.36	N 32 13 36.31	W 104 14 20.31
	9208.00	87.21	358.90	8827.95	629.94	629.41	70.09	9.39	446262.85	570514.78	N 32 13 36.54	W 104 14 20.32
	9245.00	88.68	359.54	8829.28	666.91	666.38	69.59	4.33	446299.82	570514.28	N 32 13 36.91	W 104 14 20.32
	9340.00	89.09	359.80	8831.13	761.88	761.36	69.04	0.51	446394.79	570513.73	N 32 13 37.85	W 104 14 20.33
	9435.00	89.07	359.71	8832.65	856.86	856.35	68.63	0.10	446489.77	570513.33	N 32 13 38.79	W 104 14 20.33
	9529.00	88.86	359.75	8834.35	950.84	950.33	68.19	0.23	446583.74	570512.89	N 32 13 39.72	W 104 14 20.33
	9624.00	89.22	0.02	8835.94	1045.82	1045.32	68.00	0.47	446678.72	570512.70	N 32 13 40.66	W 104 14 20.34
	9718.00	89.94	0.16	8836.63	1139.82	1139.31	68.15	0.78	446772.71	570512.84	N 32 13 41.59	W 104 14 20.33
	9813.00	87.87	359.63	8838.45	1234.79	1234.29	67.98	2.25	446867.68	570512.67	N 32 13 42.53	W 104 14 20.33
	9907.00	89.22	359.85	8840.84	1328.75	1328.26	67.55	1.46	446961.64	570512.24	N 32 13 43.46	W 104 14 20.34
	10002.00	90.65	359.51	8840.94	1423.74	1423.25	67.02	1.55	447056.62	570511.71	N 32 13 44.40	W 104 14 20.34
	10096.00	91.41	358.99	8839.25	1517.70	1517.23	65.79	0.98	447150.59	570510.48	N 32 13 45.33	W 104 14 20.36
	10191.00	91.60	358.96	8836.76	1612.64	1612.18	64.09	0.20	447245.53	570508.78	N 32 13 46.27	W 104 14 20.37
	10285.00	91.92	359.01	8833.87	1706.56	1706.12	62.42	0.34	447339.47	570507.12	N 32 13 47.20	W 104 14 20.39
11611' MD [306' FEL]	10380.00	87.73	358.75	8834.16	1801.50	1801.08	60.57	4.42	447434.42	570505.26	N 32 13 48.14	W 104 14 20.41
	10474.00	86.94	358.96	8838.53	1895.36	1894.96	58.69	0.87	447528.29	570503.39	N 32 13 49.07	W 104 14 20.43
	10569.00	89.45	0.31	8841.52	1990.30	1989.90	58.09	3.00	447623.22	570502.78	N 32 13 50.01	W 104 14 20.44
	10663.00	89.56	0.33	8842.34	2084.29	2083.90	58.61	0.12	447717.21	570503.31	N 32 13 50.94	W 104 14 20.43
	10758.00	91.08	1.05	8841.81	2179.29	2178.89	59.76	1.77	447812.19	570504.45	N 32 13 51.88	W 104 14 20.42
	10852.00	88.24	1.00	8842.36	2273.27	2272.86	61.44	3.02	447906.15	570506.13	N 32 13 52.81	W 104 14 20.40
	10948.00	88.58	1.21	8845.03	2369.23	2368.80	63.29	0.42	448002.09	570507.98	N 32 13 53.76	W 104 14 20.38
	11043.00	89.62	1.73	8846.52	2464.20	2463.76	65.73	1.22	448097.03	570510.42	N 32 13 54.69	W 104 14 20.35
	11137.00	89.11	1.83	8847.56	2558.17	2557.71	68.65	0.55	448190.97	570513.34	N 32 13 55.62	W 104 14 20.31
	11232.00	90.83	2.64	8847.61	2653.12	2652.63	72.35	2.00	448285.89	570517.04	N 32 13 56.56	W 104 14 20.27
	11327.00	90.13	1.57	8846.81	2748.07	2747.56	75.84	1.35	448380.81	570520.53	N 32 13 57.50	W 104 14 20.23
	11422.00	91.14	1.00	8845.76	2843.06	2842.53	77.97	1.22	448475.77	570522.66	N 32 13 58.44	W 104 14 20.20
	11516.00	90.47	0.49	8844.44	2937.05	2936.51	79.19	0.90	448569.74	570523.88	N 32 13 59.37	W 104 14 20.19
	11611.00	89.37	359.84	8844.57	3032.04	3031.51	79.47	1.34	448664.73	570524.16	N 32 14 0.31	W 104 14 20.16
	11706.00	87.92	359.36	8846.82	3127.00	3126.48	78.80	1.61	448759.69	570523.49	N 32 14 1.25	W 104 14 20.19
	11801.00	88.29	359.03	8849.96	3221.93	3221.42	77.47	0.52	448854.62	570522.16	N 32 14 2.19	W 104 14 20.20
	11896.00	90.41	359.18	8851.04	3316.89	3316.39	75.98	2.24	448949.59	570520.68	N 32 14 3.13	W 104 14 20.22
	11990.00	88.70	359.04	8851.77	3410.86	3410.38	74.52	1.83	449043.56	570519.22	N 32 14 4.06	W 104 14 20.24
	12085.00	89.46	358.90	8853.30	3505.81	3505.35	72.82	0.81	449138.53	570517.51	N 32 14 5.00	W 104 14 20.25
	12179.00	86.74	358.38	8856.41	3599.70	3599.26	70.59	2.95	449232.43	570515.28	N 32 14 5.93	W 104 14 20.26
	12274.00	86.97	358.38	8861.62	3694.50	3694.08	67.91	0.24	449327.24	570512.60	N 32 14 6.87	W 104 14 20.31
	12369.00	87.03	358.59	8866.60	3789.31	3788.92	65.40	0.23	449422.07	570510.09	N 32 14 7.81	W 104 14 20.34
	12464.00	87.46	359.22	8871.16	3884.17	3883.79	63.58	0.80	449516.93	570508.28	N 32 14 8.75	W 104 14 20.36
	12559.00	88.49	0.09	8874.52	3979.10	3978.73	63.01	1.42	449611.86	570507.71	N 32 14 9.69	W 104 14 20.36
	12653.00	90.00	0.30	8875.76	4073.09	4072.71	63.33	1.62	449705.84	570508.03	N 32 14 10.62	W 104 14 20.36
	12748.00	92.02	0.32	8874.08	4168.07	4167.69	63.85	2.13	449800.81	570508.54	N 32 14 11.56	W 104 14 20.35
	12843.00	92.65	0.26	8870.21	4262.99	4262.61	64.33	0.67	449895.72	570509.02	N 32 14 12.49	W 104 14 20.35
	12937.00	91.80	0.01	8866.56	4356.91	4356.54	64.55	0.94	449989.64	570509.24	N 32 14 13.42	W 104 14 20.34
	13031.00	91.27	359.63	8864.04	4450.87	4450.51	64.25	0.69	450083.60	570508.95	N 32 14 14.35	W 104 14 20.34
	13126.00	90.54	358.84	8862.54	4545.84	4545.48	62.99	1.13	450178.57	570507.68	N 32 14 15.29	W 104 14 20.36
	13221.00	90.95	0.36	8861.31	4640.82	4640.47	62.32	1.66	450273.54	570507.02	N 32 14 16.23	W 104 14 20.36
	13316.00	90.72	0.96	8859.92	4735.81	4735.45	63.42	0.68	450368.52	570508.11	N 32 14 17.17	W 104 14 20.35
	13410.00	88.52	0.82	8860.55	4829.80	4829.43	64.88	2.35	450462.49	570509.57	N 32 14 18.10	W 104 14 20.33
	13505.00	91.39	1.66	8860.62	4924.78	4924.40	66.93	3.15	450557.45	570511.63	N 32 14 19.04	W 104 14 20.31
	13600.00	88.89	1.48	8860.39	5019.75	5019.36	69.53	2.64	450652.40	570514.23	N 32 14 19.98	W 104 14 20.28

Comments	MD (ft)	Incl (°)	Azim Grid (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (N/S ° ' ")	Longitude (E/W ° ' ")
	3104.00	1.00	232.62	3103.39	-9.42	-9.38	-5.21	0.35	445624.12	570439.49	N 32 13 30.22	W 104 14 21.20
	3293.00	0.76	47.81	3292.38	-9.59	-9.54	-5.59	0.93	445623.96	570439.11	N 32 13 30.22	W 104 14 21.20
	3387.00	0.76	65.84	3386.37	-8.91	-8.87	-4.56	0.25	445624.63	570440.14	N 32 13 30.23	W 104 14 21.19
	3482.00	0.74	62.75	3481.36	-8.36	-8.33	-3.44	0.05	445625.17	570441.26	N 32 13 30.23	W 104 14 21.18
	3671.00	0.64	69.39	3670.35	-7.41	-7.40	-1.37	0.07	445626.10	570443.33	N 32 13 30.24	W 104 14 21.15
	3860.00	0.84	68.32	3859.33	-6.51	-6.52	0.91	0.11	445626.98	570445.61	N 32 13 30.25	W 104 14 21.13
	3955.00	0.96	53.08	3954.32	-5.76	-5.78	2.19	0.28	445627.72	570446.89	N 32 13 30.26	W 104 14 21.11
	4144.00	0.71	59.68	4143.30	-4.20	-4.24	4.47	0.14	445629.26	570449.17	N 32 13 30.27	W 104 14 21.09
	4333.00	0.94	33.67	4332.28	-2.31	-2.36	6.34	0.23	445631.14	570451.04	N 32 13 30.29	W 104 14 21.06
	4427.00	0.83	40.30	4426.27	-1.14	-1.20	7.21	0.16	445632.30	570451.91	N 32 13 30.30	W 104 14 21.05
	4616.00	0.85	63.19	4615.25	0.55	0.48	9.34	0.18	445633.98	570454.04	N 32 13 30.32	W 104 14 21.03
	4710.00	0.76	83.56	4709.24	0.95	0.86	10.58	0.32	445634.36	570455.28	N 32 13 30.32	W 104 14 21.01
	4899.00	0.49	74.66	4898.23	1.32	1.22	12.61	0.15	445634.72	570457.31	N 32 13 30.33	W 104 14 20.99
	4994.00	0.57	65.99	4993.23	1.62	1.52	13.43	0.12	445635.02	570458.13	N 32 13 30.33	W 104 14 20.98
	5183.00	0.39	66.90	5182.22	2.27	2.15	14.88	0.10	445635.65	570459.58	N 32 13 30.34	W 104 14 20.96
	5277.00	0.35	70.39	5276.22	2.50	2.37	15.45	0.05	445635.87	570460.15	N 32 13 30.34	W 104 14 20.96
	5371.00	0.37	63.53	5370.22	2.73	2.61	15.99	0.05	445636.11	570460.69	N 32 13 30.34	W 104 14 20.95
	5560.00	0.65	25.91	5559.21	3.98	3.84	17.01	0.22	445637.34	570461.70	N 32 13 30.35	W 104 14 20.94
	5655.00	0.74	14.48	5654.20	5.06	4.92	17.39	0.17	445638.42	570462.09	N 32 13 30.36	W 104 14 20.93
	5750.00	0.46	287.64	5749.20	5.77	5.63	17.18	0.89	445639.13	570461.88	N 32 13 30.37	W 104 14 20.94
	5844.00	1.19	284.46	5843.19	6.11	5.99	15.88	0.78	445639.49	570460.58	N 32 13 30.38	W 104 14 20.95
	5939.00	1.87	288.67	5938.15	6.84	6.73	13.46	0.73	445640.23	570458.15	N 32 13 30.38	W 104 14 20.98
	6033.00	2.09	310.52	6032.10	8.42	8.34	10.70	0.83	445641.84	570455.40	N 32 13 30.40	W 104 14 21.01
	6128.00	2.22	318.45	6127.03	10.90	10.84	8.16	0.34	445644.34	570452.86	N 32 13 30.42	W 104 14 21.04
	6222.00	1.32	289.02	6220.99	12.60	12.55	5.93	1.33	445646.05	570450.63	N 32 13 30.44	W 104 14 21.07
	6317.00	1.14	288.50	6315.97	13.24	13.21	4.00	0.19	445646.71	570448.70	N 32 13 30.45	W 104 14 21.09
	6411.00	1.70	293.27	6409.94	14.07	14.06	1.83	0.61	445647.56	570446.53	N 32 13 30.46	W 104 14 21.12
	6506.00	1.57	256.79	6504.90	14.31	14.32	-0.73	1.09	445647.82	570443.97	N 32 13 30.46	W 104 14 21.15
	6694.00	2.31	256.78	6692.79	12.81	12.86	-6.92	0.39	445646.36	570437.78	N 32 13 30.44	W 104 14 21.22
	6883.00	2.71	210.97	6881.63	8.06	8.16	-12.93	1.05	445641.66	570431.77	N 32 13 30.40	W 104 14 21.29
	6978.00	2.15	181.09	6976.55	4.34	4.45	-14.12	1.44	445637.95	570430.58	N 32 13 30.36	W 104 14 21.30
	7072.00	0.57	172.30	7070.52	2.11	2.23	-14.09	1.69	445635.73	570430.61	N 32 13 30.34	W 104 14 21.30
	7167.00	0.28	128.81	7165.51	1.50	1.61	-13.85	0.44	445635.11	570430.85	N 32 13 30.33	W 104 14 21.30
	7261.00	0.36	199.41	7259.51	1.08	1.19	-13.77	0.40	445634.69	570430.93	N 32 13 30.33	W 104 14 21.30
	7356.00	0.41	241.13	7354.51	0.63	0.74	-14.16	0.29	445634.24	570430.54	N 32 13 30.32	W 104 14 21.30
	7450.00	0.87	255.69	7448.50	0.29	0.40	-15.15	0.52	445633.90	570429.55	N 32 13 30.32	W 104 14 21.31
	7544.00	2.79	264.06	7542.45	-0.15	-0.01	-18.12	2.06	445633.49	570426.58	N 32 13 30.32	W 104 14 21.35
	7639.00	0.95	278.40	7637.40	-0.30	-0.13	-21.20	1.98	445633.37	570423.50	N 32 13 30.32	W 104 14 21.38
	7733.00	1.36	313.91	7731.38	0.58	0.76	-22.77	0.86	445634.25	570421.93	N 32 13 30.32	W 104 14 21.40
	7828.00	0.96	242.23	7826.36	0.97	1.17	-24.29	1.47	445634.67	570420.41	N 32 13 30.33	W 104 14 21.42
	7922.00	2.33	203.19	7920.33	-1.16	-0.96	-25.74	1.80	445632.54	570418.96	N 32 13 30.31	W 104 14 21.44
	8017.00	1.48	224.37	8015.27	-3.82	-3.61	-27.36	1.15	445629.89	570417.35	N 32 13 30.28	W 104 14 21.46
	8111.00	0.90	265.28	8109.25	-4.77	-4.54	-28.94	1.06	445628.96	570415.76	N 32 13 30.27	W 104 14 21.47
	8172.00	0.67	285.02	8170.25	-4.72	-4.48	-29.76	0.58	445629.02	570414.94	N 32 13 30.27	W 104 14 21.48
	8266.00	4.79	29.33	8264.12	-0.38	-0.16	-28.07	4.38	445633.34	570416.63	N 32 13 30.31	W 104 14 21.46
	8334.00	8.88	30.49	8331.77	4.58	4.78	-25.21	8.53	445638.28	570419.49	N 32 13 30.36	W 104 14 21.43
	8365.00	12.15	26.51	8362.24	9.59	9.76	-22.54	10.80	445643.26	570422.16	N 32 13 30.41	W 104 14 21.40
	8397.00	15.57	25.60	8393.31	16.50	16.65	-19.18	10.71	445650.15	570425.52	N 32 13 30.48	W 104 14 21.36
	8428.00	18.97	25.82	8422.90	24.82	24.94	-15.19	10.97	445658.44	570429.51	N 32 13 30.56	W 104 14 21.31
	8459.00	22.41	25.19	8451.90	34.75	34.83	-10.48	11.12	445668.33	570434.23	N 32 13 30.66	W 104 14 21.26
	8491.00	26.14	26.07	8481.07	46.65	46.68	-4.78	11.71	445680.18	570439.92	N 32 13 30.78	W 104 14 21.19
	8522.00	30.00	25.72	8508.41	59.82	59.81	1.59	12.46	445693.30	570446.29	N 32 13 30.91	W 104 14 21.12
	8570.00	35.80	22.10	8548.70	83.74	83.65	12.09	12.75	445717.14	570456.79	N 32 13 31.14	W 104 14 21.00
	8617.00	40.69	19.79	8585.61	110.99	110.82	22.45	10.84	445744.31	570467.15	N 32 13 31.41	W 104 14 20.88
	8664.00	46.75	18.53	8619.56	141.75	141.49	33.09	13.03	445774.98	570477.79	N 32 13 31.72	W 104 14 20.75
	8711.00	52.98	17.88	8649.84	175.96	175.61	44.30	13.30	445809.10	570489.00	N 32 13 32.05	W 104 14 20.62
	8758.00	58.12	16.31	8676.42	213.08	212.65	55.67	11.28	445846.13	570500.37	N 32 13 32.42	W 104 14 20.49
	8806.00	62.27	10.57	8700.29	253.64	253.13	65.30	13.50	445886.61	570510.00	N 32 13 32.82	W 104 14 20.37

Comments	MD (ft)	Incl (°)	Azim Grid (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (N/S ° ' ")	Longitude (E/W ° ' ")
	13694.00	89.11	1.16	8862.03	5113.72	5113.32	71.70	0.41	450746.35	570516.39	N 32 14 20.91	W 104 14 20.25
	13789.00	89.54	1.70	8863.15	5208.70	5208.28	74.07	0.73	450841.30	570518.76	N 32 14 21.85	W 104 14 20.22
	13884.00	89.72	1.67	8863.76	5303.68	5303.24	76.86	0.19	450936.25	570521.56	N 32 14 22.79	W 104 14 20.19
	13978.00	91.65	1.85	8862.64	5397.64	5397.18	79.75	2.06	451030.19	570524.44	N 32 14 23.72	W 104 14 20.15
	14073.00	91.74	1.84	8859.83	5492.57	5492.09	82.81	0.10	451125.09	570527.50	N 32 14 24.66	W 104 14 20.12
	14167.00	90.39	1.32	8858.08	5586.54	5586.04	85.40	1.54	451219.02	570530.09	N 32 14 25.59	W 104 14 20.09
	14262.00	89.74	1.20	8857.97	5681.53	5681.01	87.49	0.70	451313.99	570532.18	N 32 14 26.53	W 104 14 20.06
	14356.00	95.86	1.36	8853.39	5775.36	5774.83	89.58	6.51	451407.80	570534.28	N 32 14 27.46	W 104 14 20.04
14451' MD [309' FEL]	14451.00	94.42	359.95	8844.87	5869.97	5869.44	90.66	2.12	451502.40	570535.36	N 32 14 28.39	W 104 14 20.02
	14546.00	90.92	359.21	8840.45	5964.84	5964.32	89.97	3.77	451597.27	570534.66	N 32 14 29.33	W 104 14 20.03
	14641.00	90.82	358.45	8839.01	6059.79	6059.29	88.03	0.81	451692.23	570532.72	N 32 14 30.27	W 104 14 20.05
	14736.00	88.27	357.33	8839.76	6154.69	6154.21	84.53	2.93	451787.15	570529.22	N 32 14 31.21	W 104 14 20.09
	14830.00	91.49	357.97	8839.96	6248.56	6248.12	80.68	3.49	451881.04	570525.37	N 32 14 32.14	W 104 14 20.13
	14925.00	89.38	358.06	8839.24	6343.47	6343.05	77.39	2.22	451975.97	570522.08	N 32 14 33.08	W 104 14 20.17
	15020.00	91.90	358.61	8838.18	6438.39	6438.00	74.63	2.72	452070.91	570519.32	N 32 14 34.02	W 104 14 20.20
	15115.00	89.61	357.19	8836.92	6533.28	6532.92	71.15	2.84	452165.82	570515.84	N 32 14 34.96	W 104 14 20.24
	15210.00	92.12	357.84	8835.49	6628.13	6627.81	67.03	2.73	452260.70	570511.72	N 32 14 35.90	W 104 14 20.29
	15304.00	91.74	357.73	8832.32	6721.98	6721.69	63.40	0.42	452354.57	570508.09	N 32 14 36.83	W 104 14 20.33
	15399.00	88.85	357.32	8831.83	6816.84	6816.59	59.29	3.07	452449.46	570503.99	N 32 14 37.77	W 104 14 20.36
	15494.00	90.25	358.25	8832.58	6911.73	6911.51	55.62	1.77	452544.37	570500.32	N 32 14 38.71	W 104 14 20.42
	15588.00	90.36	0.44	8832.08	7005.71	7005.50	54.55	2.33	452638.35	570499.24	N 32 14 39.64	W 104 14 20.43
	15683.00	90.09	359.27	8831.71	7100.70	7100.49	54.31	1.26	452733.34	570499.00	N 32 14 40.58	W 104 14 20.43
	15778.00	89.51	359.94	8832.04	7195.69	7195.49	53.65	0.93	452828.33	570498.35	N 32 14 41.52	W 104 14 20.44
	15873.00	91.08	1.34	8831.55	7290.68	7290.48	54.71	2.21	452923.31	570499.41	N 32 14 42.46	W 104 14 20.43
	15968.00	91.12	1.10	8829.73	7385.66	7385.44	56.74	0.26	453018.26	570501.43	N 32 14 43.40	W 104 14 20.40
	16063.00	90.73	0.94	8828.19	7480.64	7480.41	58.43	0.44	453113.22	570503.12	N 32 14 44.34	W 104 14 20.38
	16157.00	90.69	0.59	8827.03	7574.63	7574.39	59.68	0.37	453207.20	570504.38	N 32 14 45.27	W 104 14 20.37
	16251.00	90.43	1.77	8826.11	7668.62	7668.37	61.62	1.29	453301.16	570506.31	N 32 14 46.20	W 104 14 20.34
	16346.00	90.13	2.14	8825.64	7763.58	7763.31	64.86	0.50	453396.10	570509.55	N 32 14 47.13	W 104 14 20.30
	16440.00	89.92	2.39	8825.60	7857.53	7857.24	68.57	0.35	453490.02	570513.27	N 32 14 48.06	W 104 14 20.26
	16534.00	90.09	2.32	8825.60	7951.48	7951.16	72.44	0.20	453583.93	570517.13	N 32 14 48.99	W 104 14 20.21
	16629.00	90.33	2.19	8825.25	8046.44	8046.08	76.17	0.29	453678.84	570520.87	N 32 14 49.93	W 104 14 20.17
	16723.00	91.03	2.17	8824.13	8140.39	8140.01	79.75	0.74	453772.76	570524.44	N 32 14 50.86	W 104 14 20.13
	16818.00	90.78	1.21	8822.63	8235.35	8234.96	82.55	1.04	453867.70	570527.24	N 32 14 51.80	W 104 14 20.09
	16912.00	90.00	0.68	8821.99	8329.34	8328.94	84.10	1.00	453961.67	570528.79	N 32 14 52.73	W 104 14 20.07
	17006.00	89.68	0.47	8822.25	8423.34	8422.93	85.04	0.41	454055.66	570529.74	N 32 14 53.66	W 104 14 20.06
	17101.00	90.32	0.53	8822.25	8518.34	8517.93	85.87	0.68	454150.65	570530.57	N 32 14 54.60	W 104 14 20.05
	17196.00	89.78	0.77	8822.17	8613.34	8612.92	86.95	0.62	454245.63	570531.64	N 32 14 55.54	W 104 14 20.04
	17290.00	89.03	0.61	8823.15	8707.33	8706.91	88.08	0.82	454339.61	570532.78	N 32 14 56.47	W 104 14 20.02
	17384.00	91.21	0.27	8822.95	8801.33	8800.90	88.81	2.35	454433.59	570533.50	N 32 14 57.40	W 104 14 20.01
	17479.00	89.96	359.78	8821.98	8896.32	8895.89	88.85	1.41	454528.58	570533.54	N 32 14 58.34	W 104 14 20.01
Final Survey TD, PTB [1354' FNL, 305' FEL]	17573.00	87.80	359.26	8823.82	8990.28	8989.87	88.06	2.36	454622.54	570532.75	N 32 14 59.27	W 104 14 20.02
	17635.00	87.80	359.26	8826.20	9052.22	9051.82	87.26	0.00	454684.48	570531.95	N 32 14 59.88	W 104 14 20.03

Survey Type: Def Survey

Survey Error Model: ISCWSA Rev 0 *** 3-D 95.000% Confidence 2.7955 sigma
Survey Program:

Description	Part	MD From (ft)	MD To (ft)	EOU Freq (ft)	Hole Size	Casing Diameter (in)	Survey Tool Type	Borehole / Survey
-------------	------	-----------------	---------------	------------------	-----------	-------------------------	------------------	-------------------

Comments	MD (ft)	Incl (°)	Azim Grid (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (N/S ° ' ")	Longitude (E/W ° ' ")
		1	0.000	26.000	1/98.425	30.000	30.000	NAL_MWD_IFR1+MS-Depth Only			Original Borehole / Cimarex Riverboat 12-1 W0PA Fed Com 1H (Offset) 0ft-17635ft	
		1	26.000	26.000	Act Stns	30.000	30.000	NAL_MWD_IFR1+MS-Depth Only			Original Borehole / Cimarex Riverboat 12-1 W0PA Fed Com 1H (Offset) 0ft-17635ft	
		1	26.000	17635.000	Act Stns	30.000	30.000	NAL_MWD_IFR1+MS			Original Borehole / Cimarex Riverboat 12-1 W0PA Fed Com	

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

RECEIVED

FEB 05 2020

FORM APPROVED
OMB No. 1004-0137
Expires: July 31, 2010

WELL COMPLETION OR RECOMPLETION REPORT AND LOG

5. Lease Serial No. NMLC064200
6. If Indian, Allottee or Tribe Name
7. Unit or CA Agreement Name and No.
8. Lease Name and Well No. RIVERBOAT 12/1 WOPA FED COM 1H
9. API Well No. 30-015-45305
10. Field and Pool, or Exploratory PURPLE SAGE WOLFCAMP GAS
11. Sec., T., R., M., or Block and Survey or Area Sec 12 T24S R26E Mer 1PM
12. County or Parish EDDY
13. State NM
17. Elevations (DF, KB, RT, GL)* 3237 GL
16. Date Completed ☐ D & A ☒ Ready to Prod. 09/07/2019
15. Date T.D. Reached 01/18/2019
14. Date Spudded 01/02/2019
18. Total Depth: MD 17635 TVD 8826
19. Plug Back T.D.: MD 17593 TVD 8826
20. Depth Bridge Plug Set: MD TVD
22. Was well cored? ☒ No ☐ Yes (Submit analysis) Was DST run? ☒ No ☐ Yes (Submit analysis) Directional Survey? ☐ No ☒ Yes (Submit analysis)
21. Type Electric & Other Mechanical Logs Run (Submit copy of each) CNL

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
17.500	13.375 J55	48.0	0	418		600		0	0
12.250	9.625 J55	36.0	0	1973		800		0	0
8.750	5.500 P110	20.0	0	17596		3780		0	0

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	9042	17568	9042 TO 17568	0.420	957	OPEN
B)						
C)						
D)						

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

Depth Interval	Amount and Type of Material
9042 TO 17568	405842 BBLs TOTAL FLUID; 20654498# SAND

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
09/14/2019	09/21/2019	24	→	293.0	932.0	5999.0	44.9		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	
36	SI	1290.0	→	293	932	5999	3180	PGW	

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
			→						
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status	
	SI		→						

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

ELECTRONIC SUBMISSION #496850 VERIFIED BY THE BLM WELL INFORMATION SYSTEM

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

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
DELAWARE	2071	2071	SANDSTONE; OIL WATER GAS	RUSTLER	0
BONE SPRING	5394	8708	SANDSTONE OIL GAS WATER	DELAWARE	2071
WOLFCAMP	8708	17635	SHALE GAS OIL WATER	WOLFCAMP	8708

32. Additional remarks (include plugging procedure):

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 #496850 Verified by the BLM Well Information System.
For CIMAREX ENERGY COMPANY, sent to the Carlsbad

Name (please print) TERRI STATHEM

Title MANAGER REGULATORY COMPLIANCE

Signature _____ (Electronic Submission)

Date 12/21/2019

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.

**** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ****