

District I
1625 N. French Dr., Hobbs, NM 88240
Phone: (575) 393-6161 Fax: (575) 393-0720
District II
811 S. First St., Artesia, NM 88210
Phone: (575) 748-1283 Fax: (575) 748-9720
District III
1000 Rio Uruzo Road, Aztec, NM 87410
Phone: (505) 334-6178 Fax: (505) 334-6170
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505
Phone: (505) 476-3460 Fax: (505) 476-3462

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

Form C-102
Revised August 1, 2011
Submit one copy to appropriate
District Office

☐ AMENDED REPORT

JAN 27 2016

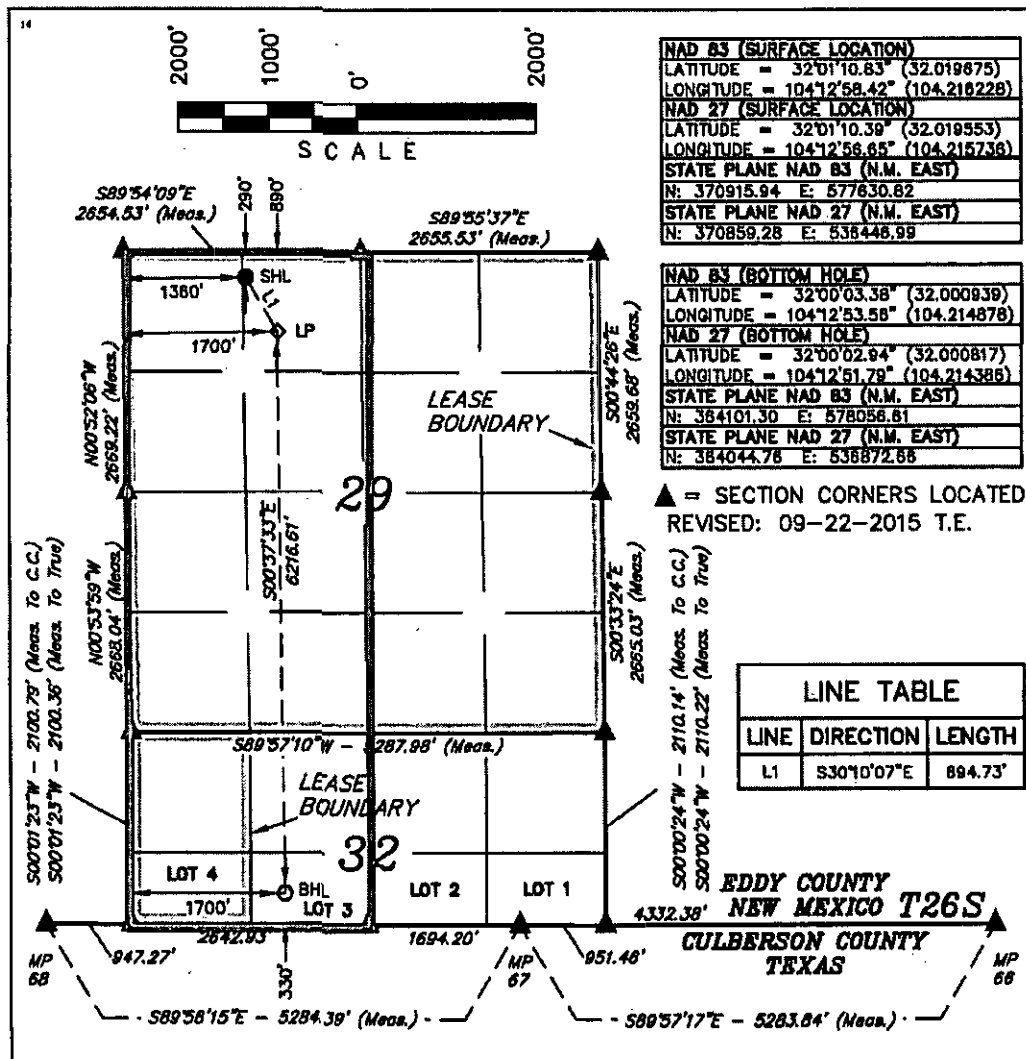
WELL LOCATION AND ACREAGE DEDICATION

¹ API Number 30-015-42178	² Pool Code 98018	³ Pool Name Wildcat: Bone Spring
⁴ Property Code 40450	⁵ Property Name MEDWICK 29 FEDERAL COM	⁶ Well Number 4H
⁷ OGRID No. 215099	⁸ Operator Name CIMAREX ENERGY CO.	⁹ Elevation 3253'

"Surface Location"									
UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
C	29	26S	27E		290	NORTH	1360	WEST	EDDY

"Bottom Hole Location If Different From Surface"									
UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
3	32	26S	27E		330	SOUTH	1700	WEST	EDDY
¹² Dedicated Acres 446.17	¹³ Joint or Infill	¹⁴ Consolidation Code	¹⁵ Order No.						

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



17 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 a working interest or leased mineral interest in the land including the proposed bottom hole location or has a right to drill this well at this location pursuant to a contract with an owner of such a mineral or working interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division.

Signature: *Aricka Easterling* Date: 08/22/15

Printed Name: Aricka Easterling

E-mail Address: aeasterling@cimarex.com

18 SURVEYOR CERTIFICATION

I hereby certify that the well location shown on this plat was plotted 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.

August 28, 2013

Date of Survey: _____
Signature and Seal of Professional Surveyor: _____

PROFESSIONAL SURVEYOR
NEW MEXICO
12446
Nelson J. Marshall
NELSON J. MARSHALL
MAR 05-15

Certificate Number: _____



Cimarex Medwick 29 Federal #4H Rev2 JLP 23Oct15 Proposal Geodetic Report
(Non-Def Plan)



Report Date: October 23, 2015 - 02:45 PM
Client: Cimarex
Field: NM Eddy County (NAD 83)
Structure / Slot: Cimarex Medwick 29 Federal #4H / Cimarex Medwick 29 Federal #4H
Well: Cimarex Medwick 29 Federal #4H
Borehole: Original Borehole
UWI / API#: Unknown / Unknown
Survey Name: Cimarex Medwick 29 Federal #4H Rev2 JLP 23Oct15
Survey Date: September 25, 2013
Tort / AHD / DDI / ERD Ratio: 124.086° / 7017.013 ft / 6.217 / 0.938
Coordinate Reference System: NAD83 New Mexico State Plane, Eastern Zone, US Feet
Location Lat / Long: N 32° 1' 10.82600", W 104° 12' 58.42305"
Location Grid N/E Y/X: N 370915.940 ftUS, E 577630.820 ftUS
CRS Grid Convergence Angle: 0.0621°
Grid Scale Factor: 0.9999106
Version / Patch: 2 8 572.0

Survey / DLS Computation: Minimum Curvature / Lubinski
Vertical Section Azimuth: 176.425° (Grid North)
Vertical Section Origin: 0 000 ft, 0 000 ft
TVD Reference Datum: Ground Level
TVD Reference Elevation: 3253.000 ft above MSL
Seabed / Ground Elevation: 3253.000 ft above MSL
Magnetic Declination: 7.592°
Total Gravity Field Strength: 998.6849mgm (9.80665 Based)
Gravity Model: DOX
Total Magnetic Field Strength: 48171.622 nT
Magnetic Dip Angle: 59.733°
Declination Date: July 15, 2015
Magnetic Declination Model: HDGM 2015
North Reference: Grid North
Grid Convergence Used: 0.0621°
Total Corr Mag North->Grid North: 7.5297°
Local Coord Referenced To: Structure Reference Point

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	0.00	0.00	88.00	0.00	0.00	0.00	0.00	N/A	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	100.00	0.00	88.00	100.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	200.00	0.00	88.00	200.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	300.00	0.00	88.00	300.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	400.00	0.00	88.00	400.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	500.00	0.00	88.00	500.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	600.00	0.00	88.00	600.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	700.00	0.00	88.00	700.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	800.00	0.00	88.00	800.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	900.00	0.00	88.00	900.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	1000.00	0.00	88.00	1000.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	1100.00	0.00	88.00	1100.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	1200.00	0.00	88.00	1200.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	1300.00	0.00	88.00	1300.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	1400.00	0.00	88.00	1400.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	1500.00	0.00	88.00	1500.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	1600.00	0.00	88.00	1600.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	1700.00	0.00	88.00	1700.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	1800.00	0.00	88.00	1800.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	1900.00	0.00	88.00	1900.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	2000.00	0.00	88.00	2000.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	2100.00	0.00	88.00	2100.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	2200.00	0.00	88.00	2200.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	

Comments	MD (m)	Incl (°)	Azim Grid (°)	TVD (m)	VSEC (m)	NS (m)	EW (m)	DLS (°/100m)	Northing (NUS)	Easting (EUS)	Latitude (N/S ° ' ")	Longitude (E/W ° ' ")
	2300.00	0.00	88.00	2300.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	2400.00	0.00	88.00	2400.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	2500.00	0.00	88.00	2500.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	2600.00	0.00	88.00	2600.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	2700.00	0.00	88.00	2700.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	2800.00	0.00	88.00	2800.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	2900.00	0.00	88.00	2900.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	3000.00	0.00	88.00	3000.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	3100.00	0.00	88.00	3100.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	3200.00	0.00	88.00	3200.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	3300.00	0.00	88.00	3300.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	3400.00	0.00	88.00	3400.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	3500.00	0.00	88.00	3500.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	3600.00	0.00	88.00	3600.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	3700.00	0.00	88.00	3700.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	3800.00	0.00	88.00	3800.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	3900.00	0.00	88.00	3900.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	4000.00	0.00	88.00	4000.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	4100.00	0.00	88.00	4100.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	4200.00	0.00	88.00	4200.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	4300.00	0.00	88.00	4300.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	4400.00	0.00	88.00	4400.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	4500.00	0.00	88.00	4500.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	4600.00	0.00	88.00	4600.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	4700.00	0.00	88.00	4700.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	4800.00	0.00	88.00	4800.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	4900.00	0.00	88.00	4900.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	5000.00	0.00	88.00	5000.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	5100.00	0.00	88.00	5100.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	5200.00	0.00	88.00	5200.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	5300.00	0.00	88.00	5300.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	5400.00	0.00	88.00	5400.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	5500.00	0.00	88.00	5500.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	5600.00	0.00	88.00	5600.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	5700.00	0.00	88.00	5700.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	5800.00	0.00	88.00	5800.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	5900.00	0.00	88.00	5900.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	6000.00	0.00	88.00	6000.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	6100.00	0.00	88.00	6100.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	6200.00	0.00	88.00	6200.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	6300.00	0.00	88.00	6300.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	6400.00	0.00	88.00	6400.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	6500.00	0.00	88.00	6500.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	6600.00	0.00	88.00	6600.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	6700.00	0.00	88.00	6700.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
	6800.00	0.00	88.00	6800.00	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	
Build 12"/100' DLS	6835.70	0.00	88.00	6835.70	0.00	0.00	0.00	0.00	370915.94	577630.82	N 32 1 10.83 W 104 12 58.42	

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 ° ' ")
Build & Turn 12"/100" DLS	6900.00	7.72	88.00	6899.81	0.12	0.15	4.32	12.00	370916.09	577635.14	N 32 1 10.83 W 104 12 58.37	
	7000.00	19.72	88.00	6996.78	0.77	0.98	27.97	12.00	370916.92	577658.79	N 32 1 10.84 W 104 12 58.10	
	7100.00	31.72	88.00	7086.71	1.96	2.49	71.26	12.00	370918.43	577702.07	N 32 1 10.85 W 104 12 57.60	
	7110.70	33.00	88.00	7095.75	2.12	2.69	76.98	12.00	370918.63	577707.80	N 32 1 10.85 W 104 12 57.53	
	7200.00	34.36	107.23	7170.27	11.77	-3.95	125.49	12.00	370911.99	577756.30	N 32 1 10.79 W 104 12 56.97	
	7300.00	39.04	125.81	7250.68	41.88	-30.83	178.18	12.00	370885.11	577808.98	N 32 1 10.52 W 104 12 56.35	
	7400.00	46.06	140.27	7324.48	91.11	-77.11	226.91	12.00	370838.83	577857.71	N 32 1 10.06 W 104 12 55.79	
	7500.00	54.49	151.40	7388.45	157.31	-140.77	269.56	12.00	370775.18	577900.36	N 32 1 9.43 W 104 12 55.29	
	7600.00	63.75	160.32	7439.79	237.56	-219.02	304.27	12.00	370696.94	577935.06	N 32 1 8.66 W 104 12 54.89	
	7700.00	73.47	167.89	7476.27	326.38	-308.44	329.51	12.00	370607.53	577960.30	N 32 1 7.77 W 104 12 54.60	
Landing Point	7800.00	83.44	174.72	7496.28	425.79	-405.12	344.19	12.00	370510.86	577974.98	N 32 1 6.81 W 104 12 54.43	
	7869.72	90.45	179.30	7500.00	495.35	-474.59	347.81	12.00	370441.40	577978.60	N 32 1 6.13 W 104 12 54.39	
	7900.00	90.45	179.30	7499.76	525.59	-504.86	348.19	0.00	370411.13	577978.97	N 32 1 5.83 W 104 12 54.39	
	8000.00	90.45	179.30	7498.98	625.46	-604.85	349.42	0.00	370311.15	577980.20	N 32 1 4.84 W 104 12 54.37	
	8100.00	90.45	179.30	7498.19	725.33	-704.84	350.65	0.00	370211.17	577981.43	N 32 1 3.85 W 104 12 54.36	
	8200.00	90.45	179.30	7497.41	825.20	-804.83	351.88	0.00	370111.19	577982.67	N 32 1 2.86 W 104 12 54.35	
	8300.00	90.45	179.30	7496.62	925.08	-904.82	353.11	0.00	370011.21	577983.90	N 32 1 1.87 W 104 12 54.33	
	8400.00	90.45	179.30	7495.83	1024.95	-1004.81	354.34	0.00	369911.23	577985.13	N 32 1 0.88 W 104 12 54.32	
	8500.00	90.45	179.30	7495.05	1124.82	-1104.80	355.57	0.00	369811.25	577986.36	N 32 0 59.89 W 104 12 54.31	
	8600.00	90.45	179.30	7494.26	1224.69	-1204.78	356.80	0.00	369711.27	577987.59	N 32 0 58.90 W 104 12 54.29	
	8700.00	90.45	179.30	7493.48	1324.56	-1304.77	358.03	0.00	369611.29	577988.82	N 32 0 57.91 W 104 12 54.28	
	8800.00	90.45	179.30	7492.69	1424.43	-1404.76	359.26	0.00	369511.31	577990.05	N 32 0 56.92 W 104 12 54.27	
	8900.00	90.45	179.30	7491.90	1524.30	-1504.75	360.49	0.00	369411.32	577991.28	N 32 0 55.93 W 104 12 54.26	
	9000.00	90.45	179.30	7491.12	1624.18	-1604.74	361.72	0.00	369311.34	577992.51	N 32 0 54.94 W 104 12 54.24	
	9100.00	90.45	179.30	7490.33	1724.05	-1704.73	362.95	0.00	369211.36	577993.74	N 32 0 53.95 W 104 12 54.23	
	9200.00	90.45	179.30	7489.54	1823.92	-1804.72	364.18	0.00	369111.38	577994.97	N 32 0 52.96 W 104 12 54.22	
	9300.00	90.45	179.30	7488.76	1923.79	-1904.71	365.41	0.00	369011.40	577996.20	N 32 0 51.97 W 104 12 54.20	
	9400.00	90.45	179.30	7487.97	2023.66	-2004.70	366.64	0.00	368911.42	577997.43	N 32 0 50.98 W 104 12 54.19	
	9500.00	90.45	179.30	7487.18	2123.53	-2104.69	367.87	0.00	368811.44	577998.66	N 32 0 50.00 W 104 12 54.18	
	9600.00	90.45	179.30	7486.40	2223.40	-2204.68	369.10	0.00	368711.46	577999.89	N 32 0 49.01 W 104 12 54.16	
	9700.00	90.45	179.30	7485.61	2323.28	-2304.67	370.33	0.00	368611.48	578001.12	N 32 0 48.02 W 104 12 54.15	
	9800.00	90.45	179.30	7484.82	2423.15	-2404.66	371.56	0.00	368511.50	578002.35	N 32 0 47.03 W 104 12 54.14	
	9900.00	90.45	179.30	7484.03	2523.02	-2504.65	372.79	0.00	368411.52	578003.58	N 32 0 46.04 W 104 12 54.13	
	10000.00	90.45	179.30	7483.25	2622.89	-2604.64	374.02	0.00	368311.54	578004.81	N 32 0 45.05 W 104 12 54.11	
	10100.00	90.45	179.30	7482.46	2722.76	-2704.62	375.25	0.00	368211.56	578006.04	N 32 0 44.06 W 104 12 54.10	
	10200.00	90.45	179.30	7481.67	2822.63	-2804.61	376.48	0.00	368111.58	578007.27	N 32 0 43.07 W 104 12 54.09	
	10300.00	90.45	179.30	7480.88	2922.50	-2904.60	377.71	0.00	368011.60	578008.50	N 32 0 42.08 W 104 12 54.07	
	10400.00	90.45	179.30	7480.10	3022.38	-3004.59	378.94	0.00	367911.62	578009.73	N 32 0 41.09 W 104 12 54.06	
	10500.00	90.45	179.30	7479.31	3122.25	-3104.58	380.17	0.00	367811.64	578010.96	N 32 0 40.10 W 104 12 54.05	
	10600.00	90.45	179.30	7478.52	3222.12	-3204.57	381.40	0.00	367711.66	578012.19	N 32 0 39.11 W 104 12 54.03	
	10700.00	90.45	179.30	7477.73	3321.99	-3304.56	382.63	0.00	367611.68	578013.42	N 32 0 38.12 W 104 12 54.02	
	10800.00	90.45	179.30	7476.94	3421.86	-3404.55	383.86	0.00	367511.70	578014.65	N 32 0 37.13 W 104 12 54.01	
	10900.00	90.45	179.30	7476.16	3521.73	-3504.54	385.09	0.00	367411.72	578015.88	N 32 0 36.14 W 104 12 53.99	
	11000.00	90.45	179.30	7475.37	3621.60	-3604.53	386.32	0.00	367311.74	578017.11	N 32 0 35.15 W 104 12 53.98	
	11100.00	90.45	179.30	7474.58	3721.48	-3704.52	387.55	0.00	367211.76	578018.34	N 32 0 34.16 W 104 12 53.97	
	11200.00	90.45	179.30	7473.79	3821.35	-3804.51	388.78	0.00	367111.78	578019.57	N 32 0 33.17 W 104 12 53.96	
	11300.00	90.45	179.30	7473.00	3921.22	-3904.50	390.02	0.00	367011.80	578020.80	N 32 0 32.18 W 104 12 53.94	
	11400.00	90.45	179.30	7472.21	4021.09	-4004.49	391.25	0.00	366911.82	578022.03	N 32 0 31.20 W 104 12 53.93	

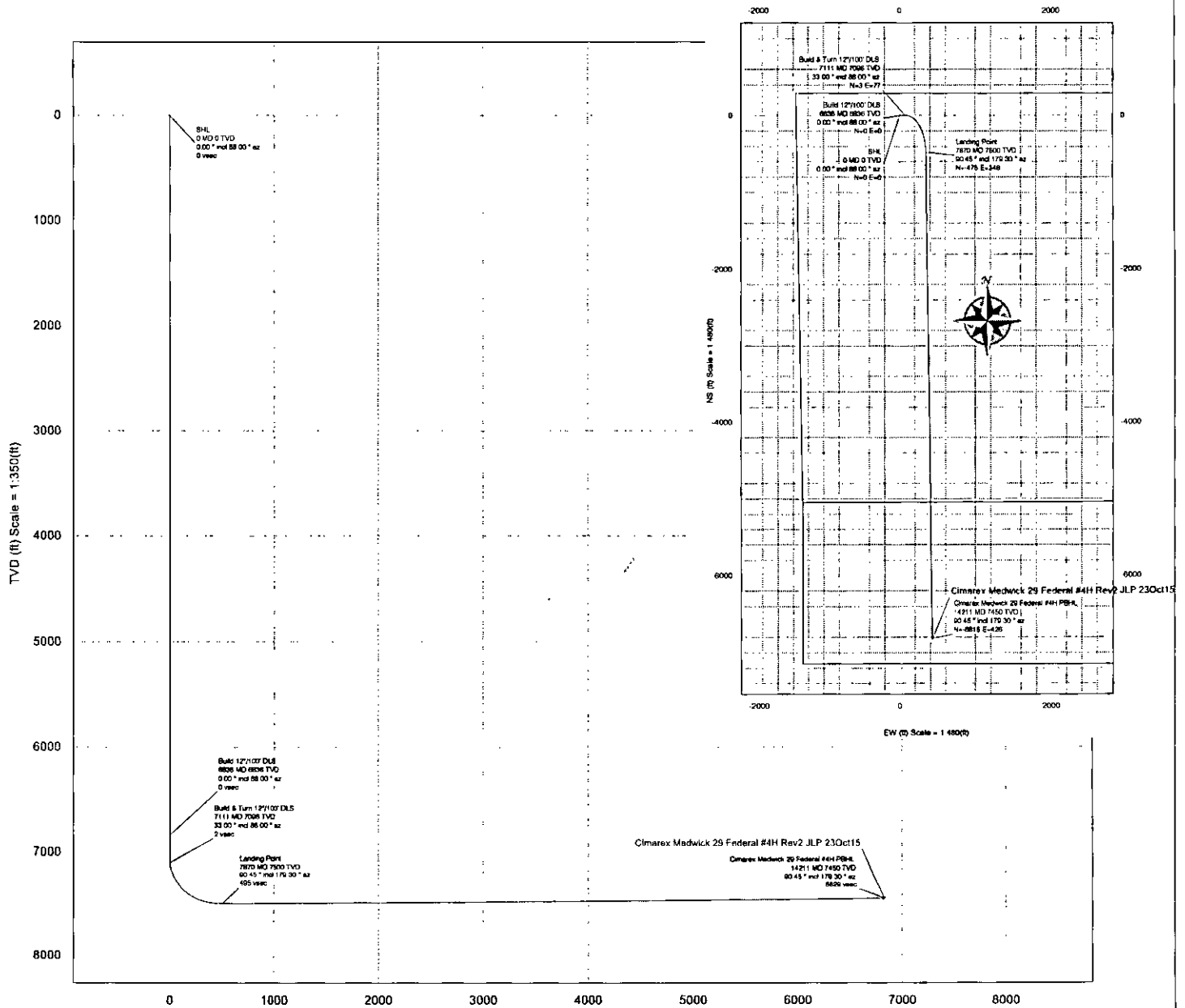
Comments	MD (ft)	Incl (°)	Azim Grid (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (NUS)	Easting (EUS)	Latitude (N/S ° ' '')	Longitude (E/W ° ' '')
	11500.00	90.45	179.30	7471.42	4120.96	-4104.48	392.48	0.00	366811.84	578023.26	N 32 0 30 21 W 104 12 53.92	
	11600.00	90.45	179.30	7470.63	4220.83	-4204.46	393.71	0.00	366711.86	578024.49	N 32 0 29 22 W 104 12 53.90	
	11700.00	90.45	179.30	7469.85	4320.70	-4304.45	394.94	0.00	366611.88	578025.72	N 32 0 28 23 W 104 12 53.89	
	11800.00	90.45	179.30	7469.06	4420.58	-4404.44	396.17	0.00	366511.90	578026.95	N 32 0 27 24 W 104 12 53.88	
	11900.00	90.45	179.30	7468.27	4520.45	-4504.43	397.40	0.00	366411.92	578028.18	N 32 0 26 25 W 104 12 53.86	
	12000.00	90.45	179.30	7467.48	4620.32	-4604.42	398.63	0.00	366311.94	578029.41	N 32 0 25 26 W 104 12 53.85	
	12100.00	90.45	179.30	7466.69	4720.19	-4704.41	399.86	0.00	366211.96	578030.64	N 32 0 24 27 W 104 12 53.84	
	12200.00	90.45	179.30	7465.90	4820.06	-4804.40	401.09	0.00	366111.98	578031.87	N 32 0 23 28 W 104 12 53.83	
	12300.00	90.45	179.30	7465.11	4919.93	-4904.39	402.32	0.00	366012.00	578033.10	N 32 0 22 29 W 104 12 53.81	
	12400.00	90.45	179.30	7464.32	5019.80	-5004.38	403.55	0.00	365912.02	578034.33	N 32 0 21 30 W 104 12 53.80	
	12500.00	90.45	179.30	7463.53	5119.68	-5104.37	404.78	0.00	365812.04	578035.56	N 32 0 20 31 W 104 12 53.79	
	12600.00	90.45	179.30	7462.74	5219.55	-5204.36	406.01	0.00	365712.06	578036.79	N 32 0 19 32 W 104 12 53.77	
	12700.00	90.45	179.30	7461.95	5319.42	-5304.35	407.24	0.00	365612.08	578038.02	N 32 0 18 33 W 104 12 53.76	
	12800.00	90.45	179.30	7461.16	5419.29	-5404.34	408.47	0.00	365512.10	578039.25	N 32 0 17 34 W 104 12 53.75	
	12900.00	90.45	179.30	7460.37	5519.16	-5504.33	409.70	0.00	365412.12	578040.48	N 32 0 16 35 W 104 12 53.73	
	13000.00	90.45	179.30	7459.58	5619.03	-5604.31	410.93	0.00	365312.14	578041.71	N 32 0 15 36 W 104 12 53.72	
	13100.00	90.45	179.30	7458.79	5718.90	-5704.30	412.16	0.00	365212.16	578042.94	N 32 0 14 37 W 104 12 53.71	
	13200.00	90.45	179.30	7458.00	5818.78	-5804.29	413.39	0.00	365112.18	578044.17	N 32 0 13 39 W 104 12 53.70	
	13300.00	90.45	179.30	7457.21	5918.65	-5904.28	414.62	0.00	365012.20	578045.40	N 32 0 12 40 W 104 12 53.68	
	13400.00	90.45	179.30	7456.42	6018.52	-6004.27	415.85	0.00	364912.22	578046.63	N 32 0 11 41 W 104 12 53.67	
	13500.00	90.45	179.30	7455.63	6118.39	-6104.26	417.08	0.00	364812.24	578047.86	N 32 0 10 42 W 104 12 53.66	
	13600.00	90.45	179.30	7454.84	6218.26	-6204.25	418.31	0.00	364712.26	578049.09	N 32 0 9 43 W 104 12 53.64	
	13700.00	90.45	179.30	7454.04	6318.13	-6304.24	419.54	0.00	364612.28	578050.32	N 32 0 8 44 W 104 12 53.63	
	13800.00	90.45	179.30	7453.25	6418.00	-6404.23	420.77	0.00	364512.30	578051.55	N 32 0 7 45 W 104 12 53.62	
	13900.00	90.45	179.30	7452.46	6517.88	-6504.22	422.00	0.00	364412.32	578052.78	N 32 0 6 46 W 104 12 53.60	
	14000.00	90.45	179.30	7451.67	6617.75	-6604.21	423.23	0.00	364312.34	578054.01	N 32 0 5 47 W 104 12 53.59	
	14100.00	90.45	179.30	7450.88	6717.62	-6704.20	424.46	0.00	364212.36	578055.24	N 32 0 4 48 W 104 12 53.58	
	14200.00	90.45	179.30	7450.09	6817.49	-6804.19	425.69	0.00	364112.38	578056.47	N 32 0 3 49 W 104 12 53.57	
Cimarex Medwick 29 Federal #4H PBHL	14211.08	90.45	179.30	7450.00	6828.55	-6815.26	425.83	0.00	364101.30	578056.61	N 32 0 3 38 W 104 12 53.58	

Survey Type: Non-Def Plan

Survey Error Model: ISDWSA 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 (in)	Casing Diameter (in)	Survey Tool Type	Borehole / Survey
	1	0.000	14211.078	1/100.000	30.000	30.000	SLB_MWD-STD	Original Borehole / Cimarex Medwick 29 Federal #4H Rev2

Borehole:	Well:	Field:	Structure:
Original Borehole	Medwick 29 Federal #4H	NM Eddy County (NAD 83)	TBD
Gravity & Magnetic Parameters			
Model: HDOM 2015	Dip: 59.733°	Date: 16-Jul-2015	Surface Location
MagDec: 7.592°	FB: 48171.422nT	Gravity FS: 999.885mgal (9.80665 m/s²)	NAD83 New Mexico State Plane, Eastern Zone, US Feet
			Lat: N 32 1 10.83 Northing: 370615.64708 Grid Conv: 0.0621"
			Lon: W 104 12 58.42 Easting: 577530.82709 Scale Fact: 0.9999106
			Miscellaneous
			Spot: 4H TVD Ref: Ground Level (3253ft above MSL)
			Plan: Rev2 JLP 23Oct15



Critical Points

Critical Point	MD	INCL	AZIM	TVD	VSEC	N(°)S(-)	E(°)W(-)	DLS
SHL	0.00	0.00	88.00	0.00	0.00	0.00	0.00	
Build 12°/100' DLS	6835.70	0.00	88.00	6835.70	0.00	0.00	0.00	0.00
Build & Turn 12°/100' DLS	7110.70	33.00	88.00	7095.75	2.12	2.89	76.98	12.00
Landing Point	7699.72	90.45	179.30	7500.00	495.35	-474.50	347.81	12.00
Cimarex Medwick 29 Federal #4H PBHL	14211.08	90.45	179.30	7450.00	6826.55	-5815.29	425.83	0.00

True
MagGrid North
Tot Corr (M+G 7.530°)
Mag Dec (7.592°)
Grid Conv (0.062°)

Cimarex Medwick 29 Federal #4H PBHL

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