



NM OIL CONSERVATION
ARTESIA DISTRICT

APR 26 2017

RECEIVED

Mewbourne Oil Company

Eddy County, New Mexico

Section 12-24S-28E Journey 12 W2MP Fee Com 2H

Journey 12 W2MP Fee Com 2H

3001543845

Original Hole

Design: Original Hole

Standard Survey Report

14 February, 2017





Microsoft Survey Report



Company: Mewbourne Oil Company
Project: Eddy County, New Mexico
Site: Section12-24S-28E Journey 12 W2MP Fee Com 2H
Well: Journey 12 W2MP Fee Com 2H
Wellbore: Original Hole
Design: Original Hole

Local Co-ordinate Reference: Well Journey 12 W2MP Fee Com 2H
TVD Reference: 2975 + 27 @ 3002.0usft (Patterson 242)
MD Reference: 2975 + 27 @ 3002.0usft (Patterson 242)
North Reference: Grid
Survey Calculation Method: Minimum Curvature
Database: Stryker_EDM

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

Site Section12-24S-28E Journey 12 W2MP Fee Com 2H

Site Position: **Northing:** 445,919.40 usft **Latitude:** 32° 13' 32.262 N
From: Map **Easting:** 588,126.50 usft **Longitude:** 104° 2' 54.060 W
Position Uncertainty: 0.0 usft **Slot Radius:** 13-3/16 " **Grid Convergence:** 0.15 °

Well Journey 12 W2MP Fee Com 2H

Well Position **+N/-S** 0.0 usft **Northing:** 445,919.40 usft **Latitude:** 32° 13' 32.262 N
+E/-W 0.0 usft **Easting:** 588,126.50 usft **Longitude:** 104° 2' 54.060 W
Position Uncertainty 0.0 usft **Wellhead Elevation:** 27.0 usft **Ground Level:** 2,975.0 usft

Wellbore Original Hole

Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2015	1/4/2017	7.22	59.99	47,937.27680822

Design Original Hole

Audit 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	73.81

Survey Program Date 2/14/2017

From (usft)	To (usft)	Survey (Wellbore)	Tool Name	Description
66.0	373.0	TeleDrift Surveys (Original Hole)	MWD	MWD v3:standard declination
447.0	15,241.0	MWD Vertical Survey (Original Hole)	MWD	MWD v3:standard declination

Survey

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
0.0	0.00	0.00	0.0	0.0	0.0	0.0	0.00	0.00	0.00
66.0	0.20	192.00	66.0	-0.1	0.0	-0.1	0.30	0.30	0.00
127.0	0.50	111.00	127.0	-0.3	0.2	0.1	0.83	0.49	-132.79
192.0	0.50	111.00	192.0	-0.5	0.7	0.6	0.00	0.00	0.00
373.0	1.80	93.00	373.0	-0.9	4.3	3.9	0.74	0.72	-9.94
TeleDrift Surveys									
447.0	1.80	89.90	446.9	-1.0	6.6	6.1	0.13	0.00	-4.19
479.0	1.80	89.50	478.9	-1.0	7.6	7.1	0.04	0.00	-1.25
540.0	1.00	42.80	539.9	-0.6	9.0	8.4	2.18	-1.31	-76.56



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604.0	1.60	351.10	603.9	0.7	9.2	9.0	1.96	0.94	-80.78
667.0	1.90	353.80	666.8	2.6	8.9	9.3	0.49	0.48	4.29
858.0	2.40	12.00	857.7	9.7	9.4	11.8	0.44	0.26	9.53
1,048.0	3.10	13.30	1,047.5	18.5	11.4	16.2	0.37	0.37	0.68
1,240.0	0.10	203.20	1,239.4	23.4	12.6	18.6	1.67	-1.56	-88.59
1,435.0	0.40	286.20	1,434.4	23.5	11.9	17.9	0.21	0.15	42.56
1,626.0	0.70	298.20	1,625.4	24.2	10.2	16.5	0.17	0.16	6.28
1,817.0	0.80	293.20	1,816.4	25.3	7.9	14.7	0.06	0.05	-2.62
2,004.0	1.00	171.00	2,003.4	24.2	7.0	13.5	0.84	0.11	-65.35
2,191.0	1.90	172.70	2,190.3	19.5	7.6	12.8	0.48	0.48	0.91
2,377.0	3.30	147.80	2,376.1	11.9	10.9	13.8	0.95	0.75	-13.39
2,565.0	0.80	100.20	2,564.0	7.1	15.1	16.4	1.50	-1.33	-25.32
2,612.0	0.90	110.10	2,611.0	6.9	15.7	17.0	0.38	0.21	21.06
2,754.0	1.00	103.00	2,753.0	6.3	18.0	19.0	0.11	0.07	-5.00
2,942.0	1.10	97.50	2,940.9	5.7	21.4	22.1	0.08	0.05	-2.93
3,129.0	0.60	96.00	3,127.9	5.3	24.1	24.7	0.27	-0.27	-0.80
3,317.0	1.00	111.70	3,315.9	4.6	26.6	26.9	0.24	0.21	8.35
3,505.0	0.70	122.10	3,503.9	3.4	29.1	28.9	0.18	-0.16	5.53
3,692.0	0.40	145.80	3,690.9	2.2	30.5	29.9	0.20	-0.16	12.67
3,879.0	0.40	123.50	3,877.9	1.3	31.4	30.5	0.08	0.00	-11.93
4,066.0	0.40	134.70	4,064.8	0.5	32.4	31.2	0.04	0.00	5.99
4,253.0	0.50	128.70	4,251.8	-0.4	33.5	32.0	0.06	0.05	-3.21
4,440.0	2.10	290.60	4,438.8	0.3	30.9	29.8	1.38	0.86	86.58
4,627.0	2.30	290.00	4,625.7	2.7	24.2	24.0	0.11	0.11	-0.32
4,815.0	2.30	280.80	4,813.5	4.7	16.9	17.6	0.20	0.00	-4.89
5,002.0	2.20	280.80	5,000.4	6.1	9.7	11.0	0.05	-0.05	0.00
5,189.0	2.10	275.10	5,187.2	7.1	2.8	4.6	0.13	-0.05	-3.05
5,376.0	2.20	265.80	5,374.1	7.1	-4.2	-2.1	0.19	0.05	-4.97
5,563.0	2.40	260.60	5,561.0	6.2	-11.7	-9.5	0.15	0.11	-2.78
5,750.0	0.70	244.30	5,747.9	5.1	-16.6	-14.5	0.93	-0.91	-8.72
5,937.0	1.20	251.50	5,934.9	4.0	-19.4	-17.6	0.27	0.27	3.85
6,124.0	1.00	213.30	6,121.8	2.0	-22.2	-20.8	0.40	-0.11	-20.43
6,311.0	1.30	209.90	6,308.8	-1.2	-24.1	-23.5	0.16	0.16	-1.82
6,499.0	0.90	234.70	6,496.8	-3.9	-26.4	-26.5	0.33	-0.21	13.19
6,686.0	1.80	274.70	6,683.7	-4.5	-30.5	-30.6	0.67	0.48	21.39
6,873.0	1.60	260.10	6,870.6	-4.7	-36.0	-35.9	0.25	-0.11	-7.81
7,060.0	1.50	284.80	7,057.6	-4.5	-41.0	-40.6	0.36	-0.05	13.21
7,248.0	1.80	339.60	7,245.5	-1.2	-44.4	-42.9	0.82	0.16	29.15
7,434.0	1.80	322.80	7,431.4	3.9	-47.2	-44.2	0.28	0.00	-9.03
7,622.0	2.30	320.80	7,619.3	9.2	-51.3	-46.7	0.27	0.27	-1.06
7,809.0	0.60	89.70	7,806.2	12.1	-52.7	-47.3	1.45	-0.91	68.93
7,997.0	1.60	22.00	7,994.2	14.5	-50.8	-44.7	0.79	0.53	-36.01



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8,184.0	2.80	342.50	8,181.1	21.3	-51.2	-43.2	1.00	0.64	-21.12
8,371.0	2.40	319.40	8,367.9	28.6	-55.1	-44.9	0.59	-0.21	-12.35
8,558.0	1.10	269.00	8,554.8	31.6	-59.4	-48.3	1.02	-0.70	-26.95
8,745.0	1.90	175.80	8,741.8	28.5	-61.0	-50.6	1.20	0.43	-49.84
8,932.0	1.70	210.40	8,928.7	23.0	-62.2	-53.3	0.58	-0.11	18.50
9,119.0	1.50	185.80	9,115.6	18.2	-63.8	-56.2	0.38	-0.11	-13.16
9,306.0	1.30	163.90	9,302.5	13.7	-63.5	-57.1	0.30	-0.11	-11.71
9,493.0	1.30	170.60	9,489.5	9.5	-62.5	-57.4	0.08	0.00	3.58
9,680.0	1.60	173.40	9,676.4	4.9	-61.9	-58.1	0.16	0.16	1.50
9,868.0	2.50	184.40	9,864.3	-1.8	-61.9	-60.0	0.52	0.48	5.85
9,977.0	2.50	176.40	9,973.2	-6.6	-61.9	-61.3	0.32	0.00	-7.34
10,024.0	2.60	129.20	10,020.2	-8.3	-61.1	-60.9	4.35	0.21	-100.43
10,055.0	5.80	92.70	10,051.1	-8.8	-58.9	-59.1	12.96	10.32	-117.74
10,087.0	9.30	81.50	10,082.8	-8.5	-54.8	-55.0	11.81	10.94	-35.00
10,118.0	12.60	83.40	10,113.2	-7.7	-48.9	-49.1	10.71	10.65	6.13
10,149.0	16.00	84.50	10,143.3	-6.9	-41.3	-41.6	11.00	10.97	3.55
10,180.0	18.20	83.70	10,172.9	-6.0	-32.3	-32.6	7.14	7.10	-2.58
10,211.0	20.40	81.40	10,202.2	-4.6	-22.1	-22.5	7.51	7.10	-7.42
10,243.0	22.50	80.70	10,231.9	-2.8	-10.5	-10.9	6.61	6.56	-2.19
10,274.0	25.40	81.60	10,260.3	-0.9	1.9	1.6	9.43	9.35	2.90
10,305.0	27.90	81.60	10,288.0	1.1	15.7	15.3	8.06	8.06	0.00
10,336.0	30.40	82.50	10,315.0	3.2	30.6	30.3	8.19	8.06	2.90
10,367.0	32.00	82.10	10,341.6	5.4	46.5	46.2	5.20	5.16	-1.29
10,399.0	34.10	82.10	10,368.4	7.8	63.8	63.4	6.56	6.56	0.00
10,430.0	36.60	81.90	10,393.7	10.3	81.6	81.2	8.07	8.06	-0.65
10,461.0	39.30	81.50	10,418.1	13.0	100.4	100.1	8.75	8.71	-1.29
10,492.0	41.80	80.50	10,441.7	16.2	120.3	120.1	8.33	8.06	-3.23
10,523.0	44.40	80.60	10,464.3	19.7	141.2	141.1	8.39	8.39	0.32
10,555.0	46.40	81.40	10,486.8	23.2	163.7	163.7	6.50	6.25	2.50
10,586.0	48.40	81.90	10,507.7	26.5	186.3	186.3	6.56	6.45	1.61
10,617.0	50.70	82.80	10,527.9	29.7	209.7	209.6	7.74	7.42	2.90
10,648.0	54.00	82.60	10,546.8	32.8	234.0	233.9	10.66	10.65	-0.65
10,679.0	57.50	82.30	10,564.2	36.2	259.4	259.2	11.32	11.29	-0.97
10,710.0	59.80	82.50	10,580.4	39.7	285.7	285.4	7.44	7.42	0.65
10,742.0	62.20	82.90	10,595.9	43.2	313.4	313.0	7.58	7.50	1.25
10,773.0	64.20	83.10	10,609.8	46.6	340.9	340.3	6.48	6.45	0.65
10,804.0	67.20	83.20	10,622.6	50.0	368.9	368.2	9.68	9.68	0.32
10,835.0	69.80	83.30	10,634.0	53.3	397.6	396.7	8.39	8.39	0.32
10,866.0	72.00	83.80	10,644.1	56.6	426.7	425.5	7.26	7.10	1.61
10,897.0	73.70	84.80	10,653.2	59.6	456.1	454.7	6.29	5.48	3.23
10,907.0	74.20	85.40	10,656.0	60.4	465.7	464.1	7.63	5.00	6.00
10,979.0	78.90	85.00	10,672.8	66.3	535.5	532.7	6.55	6.53	-0.56
11,010.0	82.70	86.40	10,677.7	68.5	566.0	562.7	13.04	12.26	4.52



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11,025.0	83.63	87.62	10,679.5	69.3	580.8	577.1	10.21	6.24	8.14
LP Journey 12 W2MP Fee Com 2H									
11,042.0	84.70	89.00	10,681.2	69.8	597.8	593.5	10.21	6.26	8.11
11,073.0	85.20	89.20	10,683.9	70.3	628.6	623.3	1.74	1.61	0.65
11,104.0	85.80	89.70	10,686.4	70.6	659.5	653.1	2.52	1.94	1.61
11,135.0	84.60	89.50	10,689.0	70.8	690.4	682.8	3.92	-3.87	-0.65
11,166.0	85.10	89.40	10,691.8	71.1	721.3	712.5	1.64	1.61	-0.32
11,197.0	86.70	89.10	10,694.0	71.5	752.2	742.3	5.25	5.16	-0.97
11,228.0	86.80	89.50	10,695.7	71.9	783.2	772.2	1.33	0.32	1.29
11,322.0	88.50	90.10	10,699.6	72.2	877.1	862.4	1.92	1.81	0.64
11,415.0	89.80	91.00	10,701.0	71.3	970.1	951.5	1.70	1.40	0.97
11,509.0	89.90	91.20	10,701.2	69.5	1,064.1	1,041.2	0.24	0.11	0.21
11,603.0	89.10	90.70	10,702.0	68.0	1,158.0	1,131.1	1.00	-0.85	-0.53
11,696.0	86.90	88.80	10,705.3	68.4	1,251.0	1,220.4	3.12	-2.37	-2.04
11,790.0	88.30	90.00	10,709.2	69.4	1,344.9	1,310.9	1.96	1.49	1.28
11,883.0	89.10	91.20	10,711.3	68.4	1,437.8	1,399.9	1.55	0.86	1.29
11,977.0	89.80	92.30	10,712.2	65.5	1,531.8	1,489.3	1.39	0.74	1.17
12,070.0	88.00	91.70	10,714.0	62.3	1,624.7	1,577.7	2.04	-1.94	-0.65
12,164.0	87.10	90.90	10,718.0	60.1	1,718.6	1,667.2	1.28	-0.96	-0.85
12,257.0	87.60	92.40	10,722.3	57.5	1,811.5	1,755.7	1.70	0.54	1.61
12,351.0	87.60	91.20	10,726.3	54.5	1,905.3	1,845.0	1.28	0.00	-1.28
12,445.0	88.00	88.60	10,729.9	54.7	1,999.3	1,935.2	2.80	0.43	-2.77
12,538.0	87.20	88.50	10,733.8	57.0	2,092.1	2,025.1	0.87	-0.86	-0.11
12,632.0	87.90	86.40	10,737.8	61.2	2,186.0	2,116.3	2.35	0.74	-2.23
12,726.0	90.90	87.00	10,738.8	66.6	2,279.8	2,208.0	3.25	3.19	0.64
12,819.0	90.20	87.60	10,737.9	71.0	2,372.7	2,298.4	0.99	-0.75	0.65
12,913.0	90.10	86.00	10,737.6	76.2	2,466.5	2,390.0	1.71	-0.11	-1.70
13,006.0	92.00	84.60	10,735.9	83.9	2,559.2	2,481.1	2.54	2.04	-1.51
13,100.0	92.00	86.80	10,732.6	90.9	2,652.9	2,573.0	2.34	0.00	2.34
13,193.0	91.60	86.60	10,729.7	96.3	2,745.7	2,663.6	0.48	-0.43	-0.22
13,286.0	88.30	88.90	10,729.8	99.9	2,838.6	2,753.9	4.33	-3.55	2.47
13,380.0	85.50	89.80	10,734.9	101.0	2,932.4	2,844.3	3.13	-2.98	0.96
13,474.0	89.00	89.40	10,739.4	101.6	3,026.3	2,934.6	3.75	3.72	-0.43
13,567.0	88.60	89.60	10,741.3	102.4	3,119.3	3,024.1	0.48	-0.43	0.22
13,660.0	91.80	90.70	10,741.0	102.2	3,212.3	3,113.4	3.64	3.44	1.18
13,754.0	88.80	90.30	10,740.5	101.4	3,306.2	3,203.4	3.22	-3.19	-0.43
13,847.0	88.00	89.40	10,743.1	101.6	3,399.2	3,292.7	1.29	-0.86	-0.97
13,941.0	91.40	93.90	10,743.6	98.9	3,493.1	3,382.2	6.00	3.62	4.79
14,034.0	89.20	93.50	10,743.1	92.9	3,585.9	3,469.6	2.40	-2.37	-0.43
14,128.0	91.10	93.60	10,742.9	87.1	3,679.7	3,558.1	2.02	2.02	0.11
14,221.0	89.20	90.50	10,742.6	83.8	3,772.7	3,646.4	3.91	-2.04	-3.33
14,315.0	88.90	92.10	10,744.2	81.6	3,866.6	3,736.1	1.73	-0.32	1.70
14,408.0	90.10	89.40	10,745.0	80.4	3,959.6	3,825.0	3.18	1.29	-2.90



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Wellbore: Original Hole
Design: Original Hole

Local Co-ordinate Reference: Well Journey 12 W2MP Fee Com 2H
TVD Reference: 2975 + 27 @ 3002.0usft (Patterson 242)
MD Reference: 2975 + 27 @ 3002.0usft (Patterson 242)
North Reference: Grid
Survey Calculation Method: Minimum Curvature
Database: Stryker_EDM

Survey

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
14,502.0	88.40	88.40	10,746.2	82.2	4,053.6	3,915.8	2.10	-1.81	-1.06
14,595.0	90.60	88.60	10,747.1	84.7	4,146.5	4,005.7	2.38	2.37	0.22
14,689.0	89.40	88.40	10,747.1	87.1	4,240.5	4,096.6	1.29	-1.28	-0.21
14,782.0	88.00	88.40	10,749.2	89.7	4,333.4	4,186.6	1.51	-1.51	0.00
14,876.0	90.50	90.40	10,750.4	90.7	4,427.4	4,277.1	3.41	2.66	2.13
14,970.0	85.90	88.30	10,753.4	91.8	4,521.3	4,367.6	5.38	-4.89	-2.23
15,063.0	89.90	91.10	10,756.8	92.2	4,614.2	4,457.0	5.25	4.30	3.01
15,157.0	89.20	91.30	10,757.5	90.3	4,708.2	4,546.7	0.77	-0.74	0.21
15,181.0	88.80	91.10	10,757.9	89.8	4,732.2	4,569.6	1.86	-1.67	-0.83
15,241.0	88.80	91.10	10,759.2	88.6	4,792.2	4,626.9	0.00	0.00	0.00

15241' MD Projected to Bit - PHBL Journey 12 W2MP Fee Com 2H

Design Annotations

Measured Depth (usft)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Comment
373.0	373.0	-0.9	4.3	Teledrift Surveys
15,241.0	10,759.2	88.6	4,792.2	15241' MD Projected to Bit



NM OIL CONSERVATION

ARTESIA DISTRICT

APR 26 2017

RECEIVED

March 17, 2017

New Mexico Energy, Minerals and Natural Resources Department

Attn: Oil Conservation Division

1220 South St. Francis Drive

Santa Fe, NM 87505

Attn: Jackie Lathan

Re: Mewbourne Oil Company

Journey 12 W2MP Fee Com #2H

Wolfcamp, Gas

Eddy County, New Mexico

API# 30-015-43845

Enclosed please find the original and one (1) copy of the survey performed on the reference well by STRYKER ENERGY DIRECTIONAL SERVICES, L.L.C. Other information required by your office is as follows:

<u>Name & Title</u>	<u>Drainhole No.</u>	<u>Survey Depths</u>	<u>Dates Performed</u>	<u>Type Survey</u>
Travis Brumlow	Original Hole	447ft. to 15,181ft.	01-24-17 to 02-15-17	MWD Survey

A certified plat on which the bottom-hole location is oriented to both surface location and to the lease lines (or unit lines in case of pooling) is attached to the survey report. If any other information is required, please contact the undersigned at the letterhead address and phone number.

Todd Estes

Enclosures

CC:

Mewbourne Oil Company

Attn: Frosty Lathan

P.O. Box 5720

Hobbs, NM 88241

Mewbourne Oil Company

Attn: Robin Terrell

P.O. Box 5720

Hobbs, NM 88241

NMEMaNRD\Mewbourne Oil Company\Journey 12 W2MP Fee Com #2H\M171003

STRYKER ENERGY DIRECTIONAL SERVICES, L.L.C.

P.O. Box 1250

Montgomery, TX 77356

Office (936) 582-7296 * Fax (936)-588-4163



NM OIL CONSERVATION

ARTESIA DISTRICT

APR 26 2017

RECEIVED

March 17, 2017

Survey Certification Report

STATE OF TEXAS

COUNTY OF Montgomery

I, Todd Estes, certify that I am employed by STRYKER ENERGY DIRECTIONAL SERVICES, L.L.C., and that I did on the day(s) of January 24, 2017, through February 15, 2017 conduct or supervise the taking of a SEDS Original Hole MWD Survey from a depth of 447 feet to a depth of 15,181 feet; that I am authorized and qualified to make this report; that this survey was conducted at the request of Mewbourne Oil Company, for the Journey 12 W2MP Fee Com #2H well, API # **30-015-43845** in Eddy County, New Mexico; and that I have reviewed this report and find that it conforms to the principles as set forth by STRYKER ENERGY DIRECTIONAL SERVICES, L.L.C.

A handwritten signature in black ink, appearing to read "Todd Estes", written over a horizontal line.

Todd Estes

STRYKER ENERGY DIRECTIONAL SERVICES, L.L.C.

STRYKER ENERGY DIRECTIONAL SERVICES, L.L.C.

P.O. Box 1250

Montgomery, TX 77356

Office (936) 582-7296 * Fax (936)-588-4163

APR 26 2017

RECEIVED



Microsoft
MWD Surveys



Company: Mewbourne Oil Company
Project: Eddy County, New Mexico
Site: Section 12-24S-26E Journey 12 W2MP Fee Com
Well: Journey 12 W2MP Fee Com 2H
Wellbore: Original Hole
Design: Original Hole

Local Co-ordinate Reference: Well Journey 12 W2MP Fee Com 2H
TVD Reference: 2975 + 27 @ 3002.0usft (Patterson 242)
MD Reference: 2975 + 27 @ 3002.0usft (Patterson 242)
North Reference: Grid
Survey Calculation Method: Minimum Curvature
Database: Stryker_EDM

Survey Program Date 2/14/2017

From (usft)	To (usft)	Survey (Wellbore)	Tool Name	Description
66.0	373.0	TeleDrift Surveys (Original Hole)	MWD	MWD v3: standard declination
447.0	15,241.0	MWD Vertical Survey (Original Hole)	MWD	MWD v3: standard declination

Survey

MD (usft)	Inc (°)	Azi (azimuth) (°)	TVD (usft)	N/S (usft)	E/W (usft)	Closure Distance (usft)	Closure Azimuth (°)
373.0	1.80	93.00	373.0	-0.9	4.3	4.4	102.40
447.0	1.80	89.90	446.9	-1.0	6.6	6.7	98.63
479.0	1.80	89.50	478.9	-1.0	7.6	7.7	97.47
540.0	1.00	42.80	539.9	-0.6	9.0	9.0	93.84
604.0	1.60	351.10	603.9	0.7	9.2	9.2	85.71
667.0	1.90	353.80	666.8	2.6	8.9	9.3	73.81
858.0	2.40	12.00	857.7	9.7	9.4	13.5	44.34
1,048.0	3.10	13.30	1,047.5	18.5	11.4	21.8	31.68
1,240.0	0.10	203.20	1,239.4	23.4	12.6	26.6	28.20
1,435.0	0.40	286.20	1,434.4	23.5	11.9	26.3	26.79
1,626.0	0.70	298.20	1,625.4	24.2	10.2	26.3	22.81
1,817.0	0.80	293.20	1,816.4	25.3	7.9	26.5	17.41
2,004.0	1.00	171.00	2,003.4	24.2	7.0	25.2	16.11
2,191.0	1.90	172.70	2,190.3	19.5	7.6	21.0	21.38
2,377.0	3.30	147.80	2,376.1	11.9	10.9	16.1	42.39
2,565.0	0.80	100.20	2,564.0	7.1	15.1	16.7	64.72
2,612.0	0.90	110.10	2,611.0	6.9	15.7	17.2	66.23
2,754.0	1.00	103.00	2,753.0	6.3	18.0	19.0	70.80
2,942.0	1.10	97.50	2,940.9	5.7	21.4	22.1	75.17
3,129.0	0.60	96.00	3,127.9	5.3	24.1	24.7	77.56
3,317.0	1.00	111.70	3,315.9	4.6	26.6	27.0	80.17



Microsoft
MWD Surveys



Company: Mewbourne Oil Company
Project: Eddy County, New Mexico
Site: Section 12-24S-28E Journey 12 W2MP Fee Com
Well: Journey 12 W2MP Fee Com 2H
Wellbore: Original Hole
Design: Original Hole

Local Co-ordinate Reference: Well Journey 12 W2MP Fee Com 2H
TVD Reference: 2975 + 27 @ 3002.0usft (Patterson 242)
MD Reference: 2975 + 27 @ 3002.0usft (Patterson 242)
North Reference: Grid
Survey Calculation Method: Minimum Curvature
Database: Stryker_EDM

Survey

MD (usft)	Inc (°)	Azi (azimuth) (°)	TVD (usft)	N/S (usft)	E/W (usft)	Closure Distance (usft)	Closure Azimuth (°)
3,505.0	0.70	122.10	3,503.9	3.4	29.1	29.3	83.35
3,692.0	0.40	145.80	3,690.9	2.2	30.5	30.5	85.78
3,879.0	0.40	123.50	3,877.9	1.3	31.4	31.4	87.54
4,066.0	0.40	134.70	4,064.8	0.5	32.4	32.4	89.06
4,253.0	0.50	128.70	4,251.8	-0.4	33.5	33.5	90.75
4,440.0	2.10	290.60	4,438.8	0.3	30.9	30.9	89.53
4,627.0	2.30	290.00	4,625.7	2.7	24.2	24.3	83.52
4,815.0	2.30	280.80	4,813.5	4.7	16.9	17.6	74.35
5,002.0	2.20	280.80	5,000.4	6.1	9.7	11.5	57.80
5,189.0	2.10	275.10	5,187.2	7.1	2.8	7.6	21.35
5,376.0	2.20	265.80	5,374.1	7.1	-4.2	8.3	329.41
5,563.0	2.40	260.60	5,561.0	6.2	-11.7	13.2	298.13
5,750.0	0.70	244.30	5,747.9	5.1	-16.6	17.3	287.12
5,937.0	1.20	251.50	5,934.9	4.0	-19.4	19.8	281.58
6,124.0	1.00	213.30	6,121.8	2.0	-22.2	22.3	275.14
6,311.0	1.30	209.90	6,308.8	-1.2	-24.1	24.2	267.14
6,499.0	0.90	234.70	6,496.8	-3.9	-26.4	26.7	261.58
6,686.0	1.80	274.70	6,683.7	-4.5	-30.5	30.9	261.59
6,873.0	1.60	260.10	6,870.6	-4.7	-36.0	36.3	262.53
7,060.0	1.50	284.80	7,057.6	-4.5	-41.0	41.2	263.67
7,248.0	1.80	339.60	7,245.5	-1.2	-44.4	44.4	268.51
7,434.0	1.80	322.80	7,431.4	3.9	-47.2	47.3	274.74
7,622.0	2.30	320.80	7,619.3	9.2	-51.3	52.2	280.15
7,809.0	0.60	89.70	7,806.2	12.1	-52.7	54.1	282.93
7,997.0	1.60	22.00	7,994.2	14.5	-50.8	52.8	285.98
8,184.0	2.80	342.50	8,181.1	21.3	-51.2	55.4	292.62
8,371.0	2.40	319.40	8,367.9	28.6	-55.1	62.1	297.48



Microsoft
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Design: Original Hole

Local Co-ordinate Reference: Well Journey 12 W2MP Fee Com 2H
TVD Reference: 2975 + 27 @ 3002.0usft (Patterson 242)
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North Reference: Grid
Survey Calculation Method: Minimum Curvature
Database: Stryker_EDM

Survey

MD (usft)	Inc (°)	Azi (azimuth) (°)	TVD (usft)	N/S (usft)	E/W (usft)	Closure Distance (usft)	Closure Azimuth (°)
8,558.0	1.10	269.00	8,554.8	31.6	-59.4	67.3	297.99
8,745.0	1.90	175.80	8,741.8	28.5	-61.0	67.3	295.02
8,932.0	1.70	210.40	8,928.7	23.0	-62.2	66.3	290.29
9,119.0	1.50	185.80	9,115.6	18.2	-63.8	66.4	285.88
9,306.0	1.30	163.90	9,302.5	13.7	-63.5	64.9	282.16
9,493.0	1.30	170.60	9,489.5	9.5	-62.5	63.3	278.68
9,680.0	1.60	173.40	9,676.4	4.9	-61.9	62.1	274.49
9,868.0	2.50	184.40	9,864.3	-1.8	-61.9	61.9	268.30
9,977.0	2.50	176.40	9,973.2	-6.6	-61.9	62.3	263.94
10,024.0	2.60	129.20	10,020.2	-8.3	-61.1	61.6	262.28
10,055.0	5.80	92.70	10,051.1	-8.8	-58.9	59.6	261.52
10,087.0	9.30	81.50	10,082.8	-8.5	-54.8	55.4	261.19
10,118.0	12.60	83.40	10,113.2	-7.7	-48.9	49.5	261.03
10,149.0	16.00	84.50	10,143.3	-6.9	-41.3	41.9	260.48
10,180.0	18.20	83.70	10,172.9	-6.0	-32.3	32.8	259.49
10,211.0	20.40	81.40	10,202.2	-4.6	-22.1	22.6	258.12
10,243.0	22.50	80.70	10,231.9	-2.8	-10.5	10.9	255.00
10,274.0	25.40	81.60	10,260.3	-0.9	1.9	2.1	115.22
10,305.0	27.90	81.60	10,288.0	1.1	15.7	15.7	85.84
10,336.0	30.40	82.50	10,315.0	3.2	30.6	30.8	83.99
10,367.0	32.00	82.10	10,341.6	5.4	46.5	46.8	83.41
10,399.0	34.10	82.10	10,368.4	7.8	63.8	64.3	83.05
10,430.0	36.60	81.90	10,393.7	10.3	81.6	82.2	82.82
10,461.0	39.30	81.50	10,418.1	13.0	100.4	101.3	82.61
10,492.0	41.80	80.50	10,441.7	16.2	120.3	121.4	82.34
10,523.0	44.40	80.60	10,464.3	19.7	141.2	142.6	82.08
10,555.0	46.40	81.40	10,486.8	23.2	163.7	165.4	81.93



Microsoft
MWD Surveys



Company: Mewbourne Oil Company
Project: Eddy County, New Mexico
Site: Section12-24S-28E Journey 12 W2MP Fee Com
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MD (usft)	Inc (°)	Azi (azimuth) (°)	TVD (usft)	N/S (usft)	E/W (usft)	Closure Distance (usft)	Closure Azimuth (°)
10,586.0	48.40	81.90	10,507.7	26.5	186.3	188.2	81.89
10,617.0	50.70	82.80	10,527.9	29.7	209.7	211.8	81.95
10,648.0	54.00	82.60	10,546.8	32.8	234.0	236.3	82.02
10,679.0	57.50	82.30	10,564.2	36.2	259.4	261.9	82.07
10,710.0	59.80	82.50	10,580.4	39.7	285.7	288.4	82.10
10,742.0	62.20	82.90	10,595.9	43.2	313.4	316.4	82.15
10,773.0	64.20	83.10	10,609.8	46.6	340.9	344.0	82.22
10,804.0	67.20	83.20	10,622.6	50.0	368.9	372.3	82.29
10,835.0	69.80	83.30	10,634.0	53.3	397.6	401.1	82.36
10,866.0	72.00	83.80	10,644.1	56.6	426.7	430.4	82.44
10,897.0	73.70	84.80	10,653.2	59.6	456.1	460.0	82.56
10,907.0	74.20	85.40	10,656.0	60.4	465.7	469.6	82.61
10,979.0	78.90	85.00	10,672.8	66.3	535.5	539.6	82.95
11,010.0	82.70	86.40	10,677.7	68.5	566.0	570.1	83.09
11,025.0	83.63	87.62	10,679.5	69.3	580.8	584.9	83.19
LP Journey 12 W2MP Fee Com 2H							
11,042.0	84.70	89.00	10,681.2	69.8	597.8	601.8	83.34
11,073.0	85.20	89.20	10,684.0	70.3	628.6	632.6	83.62
11,104.0	85.80	89.70	10,686.4	70.6	659.5	663.3	83.89
11,135.0	84.60	89.50	10,689.0	70.8	690.4	694.1	84.14
11,166.0	85.10	89.40	10,691.8	71.1	721.3	724.8	84.37
11,197.0	86.70	89.10	10,694.0	71.5	752.2	755.6	84.57
11,228.0	86.80	89.50	10,695.7	71.9	783.2	786.5	84.75
11,322.0	88.50	90.10	10,699.6	72.2	877.1	880.1	85.29
11,415.0	89.80	91.00	10,701.0	71.3	970.1	972.7	85.79
11,509.0	89.90	91.20	10,701.2	69.5	1,064.1	1,066.3	86.26
11,603.0	89.10	90.70	10,702.0	68.0	1,158.0	1,160.0	86.64



Microsoft
MWD Surveys



Company: Mewbourne Oil Company
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Site: Section12-24S-28E Journey 12 W2MP Fee Com
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Survey

MD (usft)	Inc (°)	Azi (azimuth) (°)	TVD (usft)	N/S (usft)	E/W (usft)	Closure Distance (usft)	Closure Azimuth (°)
11,696.0	86.90	88.80	10,705.3	68.4	1,251.0	1,252.8	86.87
11,790.0	88.30	90.00	10,709.2	69.4	1,344.9	1,346.7	87.05
11,883.0	89.10	91.20	10,711.3	68.4	1,437.8	1,439.5	87.28
11,977.0	89.80	92.30	10,712.2	65.5	1,531.8	1,533.2	87.55
12,070.0	88.00	91.70	10,714.0	62.3	1,624.7	1,625.9	87.81
12,164.0	87.10	90.90	10,718.0	60.1	1,718.6	1,719.7	88.00
12,257.0	87.60	92.40	10,722.3	57.5	1,811.5	1,812.4	88.18
12,351.0	87.60	91.20	10,726.3	54.5	1,905.3	1,906.1	88.36
12,445.0	88.00	88.60	10,729.9	54.7	1,999.3	2,000.0	88.43
12,538.0	87.20	88.50	10,733.8	57.0	2,092.1	2,092.9	88.44
12,632.0	87.90	86.40	10,737.8	61.2	2,186.0	2,186.8	88.40
12,726.0	90.90	87.00	10,738.8	66.6	2,279.8	2,280.8	88.33
12,819.0	90.20	87.60	10,737.9	71.0	2,372.7	2,373.7	88.29
12,913.0	90.10	86.00	10,737.6	76.2	2,466.5	2,467.7	88.23
13,006.0	92.00	84.60	10,735.9	83.9	2,559.2	2,560.6	88.12
13,100.0	92.00	86.80	10,732.6	90.9	2,652.9	2,654.4	88.04
13,193.0	91.60	86.60	10,729.7	96.3	2,745.7	2,747.4	87.99
13,286.0	88.30	88.90	10,729.8	99.9	2,838.6	2,840.3	87.98
13,380.0	85.50	89.80	10,734.9	101.0	2,932.4	2,934.2	88.03
13,474.0	89.00	89.40	10,739.4	101.6	3,026.3	3,028.0	88.08
13,567.0	88.60	89.60	10,741.3	102.4	3,119.3	3,121.0	88.12
13,660.0	91.80	90.70	10,741.0	102.2	3,212.3	3,213.9	88.18
13,754.0	88.80	90.30	10,740.5	101.4	3,306.2	3,307.8	88.24
13,847.0	88.00	89.40	10,743.1	101.6	3,399.2	3,400.7	88.29
13,941.0	91.40	93.90	10,743.6	98.9	3,493.1	3,494.5	88.38
14,034.0	89.20	93.50	10,743.1	92.9	3,585.9	3,587.1	88.52
14,128.0	91.10	93.60	10,742.9	87.1	3,679.7	3,680.8	88.64



Microsoft
MWD Surveys



Company: Mewbourne Oil Company
Project: Eddy County, New Mexico
Site: Section 12-24S-28E Journey 12 W2MP Fee Com
Well: Journey 12 W2MP Fee Com 2H
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Local Co-ordinate Reference: Well Journey 12 W2MP Fee Com 2H
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MD Reference: 2975 + 27 @ 3002.0usft (Patterson 242)
North Reference: Grid
Survey Calculation Method: Minimum Curvature
Database: Stryker_EDM

Survey

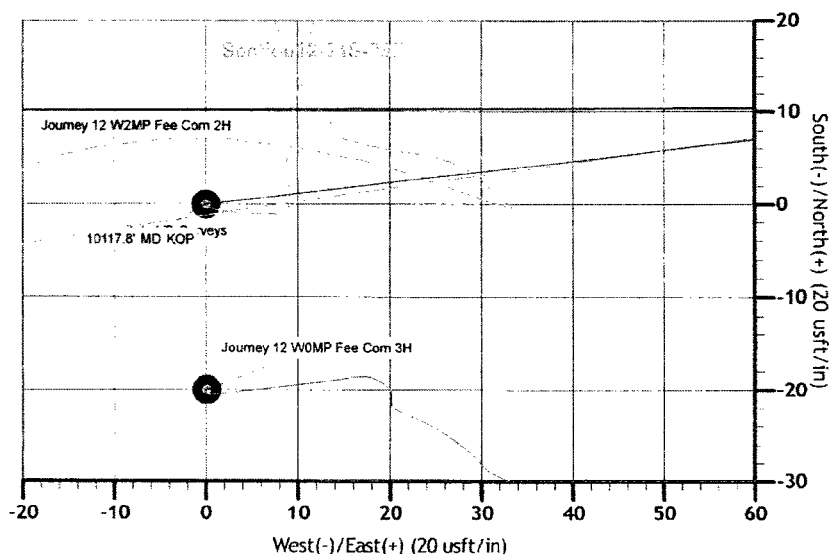
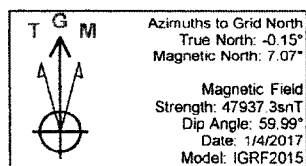
MD (usft)	Inc (°)	Azi (azimuth) (°)	TVD (usft)	N/S (usft)	E/W (usft)	Closure Distance (usft)	Closure Azimuth (°)
14,221.0	89.20	90.50	10,742.6	83.8	3,772.7	3,773.6	88.73
14,315.0	88.90	92.10	10,744.2	81.6	3,866.6	3,867.5	88.79
14,408.0	90.10	89.40	10,745.0	80.4	3,959.6	3,960.4	88.84
14,502.0	88.40	88.40	10,746.2	82.2	4,053.6	4,054.4	88.84
14,595.0	90.60	88.60	10,747.1	84.7	4,146.5	4,147.4	88.83
14,689.0	89.40	88.40	10,747.1	87.1	4,240.5	4,241.4	88.82
14,782.0	88.00	88.40	10,749.2	89.7	4,333.4	4,334.4	88.81
14,876.0	90.50	90.40	10,750.4	90.7	4,427.4	4,428.3	88.83
14,970.0	88.90	88.30	10,753.4	91.8	4,521.3	4,522.3	88.84
15,063.0	89.90	91.10	10,756.8	92.2	4,614.2	4,615.2	88.85
15,157.0	89.20	91.30	10,757.5	90.3	4,708.2	4,709.1	88.90
15,181.0	88.80	91.10	10,757.9	89.8	4,732.2	4,733.1	88.91
15,241.0	88.80	91.10	10,759.2	88.6	4,792.2	4,793.0	88.94

15241' MD Projected to Bit - PHBL Journey 12 W2MP Fee Com 2H

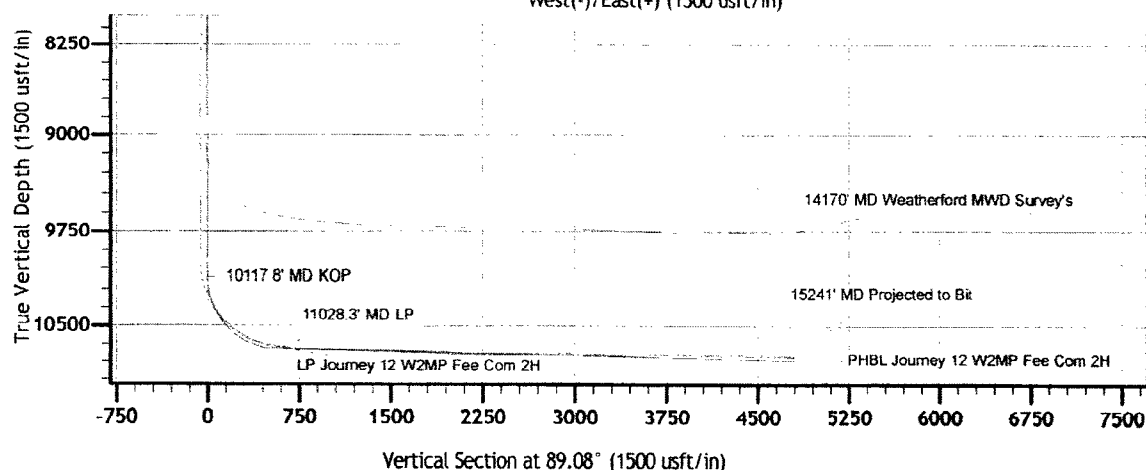
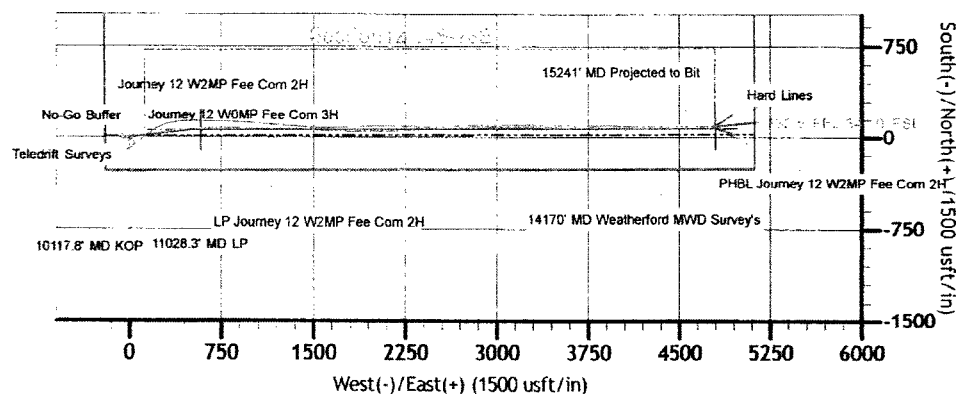
Survey Annotations

Measured Depth (usft)	Vertical Depth (usft)	Local Coordinates +N/-S (usft)	+E/-W (usft)	Comment
15,241.0	10,759.2	88.6	4,792.2	15241' MD Projected to Bit

GEODETIC ZONE: New Mexico East 3001 2975 + 27 @ 3002.0usft (Patterson 242) GROUND ELEVATION: 2975.0										Slot
+N/-S	+E/-W	Northing	Easting	Latitude	Longitude					
C.O	0.0	445919.40	588126.50	32° 13' 32.262 N	104° 2' 54.060 W					
PLAN SECTIONS										
Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	VSeet	Target
1	0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.0	
2	10117.8	0.00	0.00	10117.8	0.0	0.0	0.00	0.00	0.0	
3	10927.9	80.98	83.31	10683.9	56.3	480.0	10.00	83.31	480.8	
4	11028.3	88.65	89.80	10693.0	62.2	579.6	10.00	40.41	580.5	LP Journey 12 W2MP Fee Corn 2H
5	15244.4	88.65	89.80	10792.0	76.9	4794.6	0.00	0.00	4795.2	PHBL Journey 12 W2MP Fee Corn 2H



SHL 270' FSL: 200' FWL
Section 12-24S-28E
PBHL 330' FSL: 330' FEL
Section 12-24S-28E





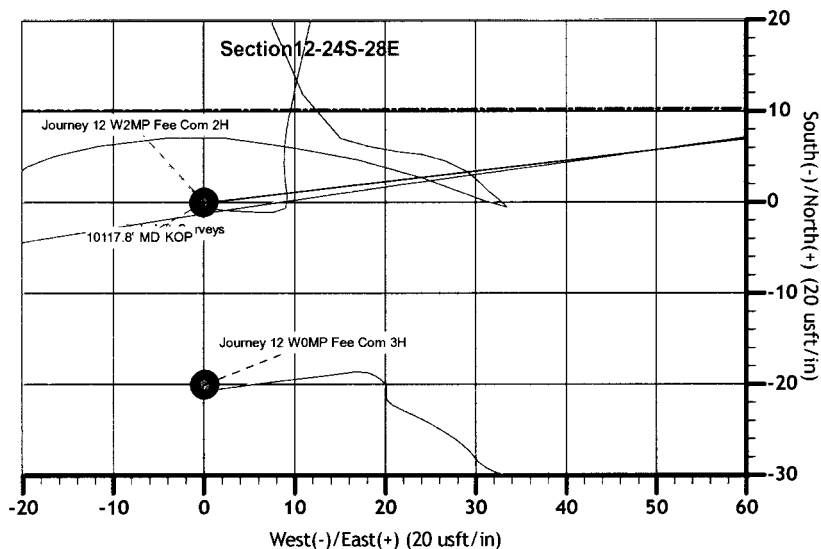
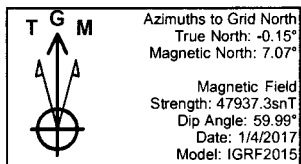
COMPANY: Mewbourne Oil Company
WELL: Journey 12 W2MP Fee Com 2H
COUNTY: Eddy County, New Mexico
DATUM: NAD 1927 (NADCON CONUS)
RIG: Patterson Patterson 242



GRID CORRECTION: To convert a Magnetic Direction to a Grid Direction, Add 7.07°

OFFICE: 936.582.7296

GEODETIC ZONE: New Mexico East 3001											Slot
2975 + 27 @ 3002.0usft (Patterson 242)											
GROUND ELEVATION: 2975.0											
+N/-S	+E/-W	Northing	Easting	Latitude	Longitude						
0.0	0.0	445919.40	588126.50	32° 13' 32.262 N	104° 2' 54.060 W						
PLAN SECTIONS											
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	10117.8	0.00	0.00	10117.8	0.0	0.0	0.00	0.00	0.0		
3	10927.9	80.98	83.31	10683.9	56.3	480.0	10.00	83.31	480.8		
4	11028.3	88.65	89.80	10693.0	62.2	579.6	10.00	40.41	580.5	LP Journey 12 W2MP Fee Com 2H	
5	15244.4	88.65	89.80	10792.0	76.9	4794.6	0.00	0.00	4795.2	PHBL Journey 12 W2MP Fee Com 2H	



SHL 270' FSL; 200' FWL
Section 12-24S-28E
PBHL 330' FSL; 330' FEL
Section 12-24S-28E

