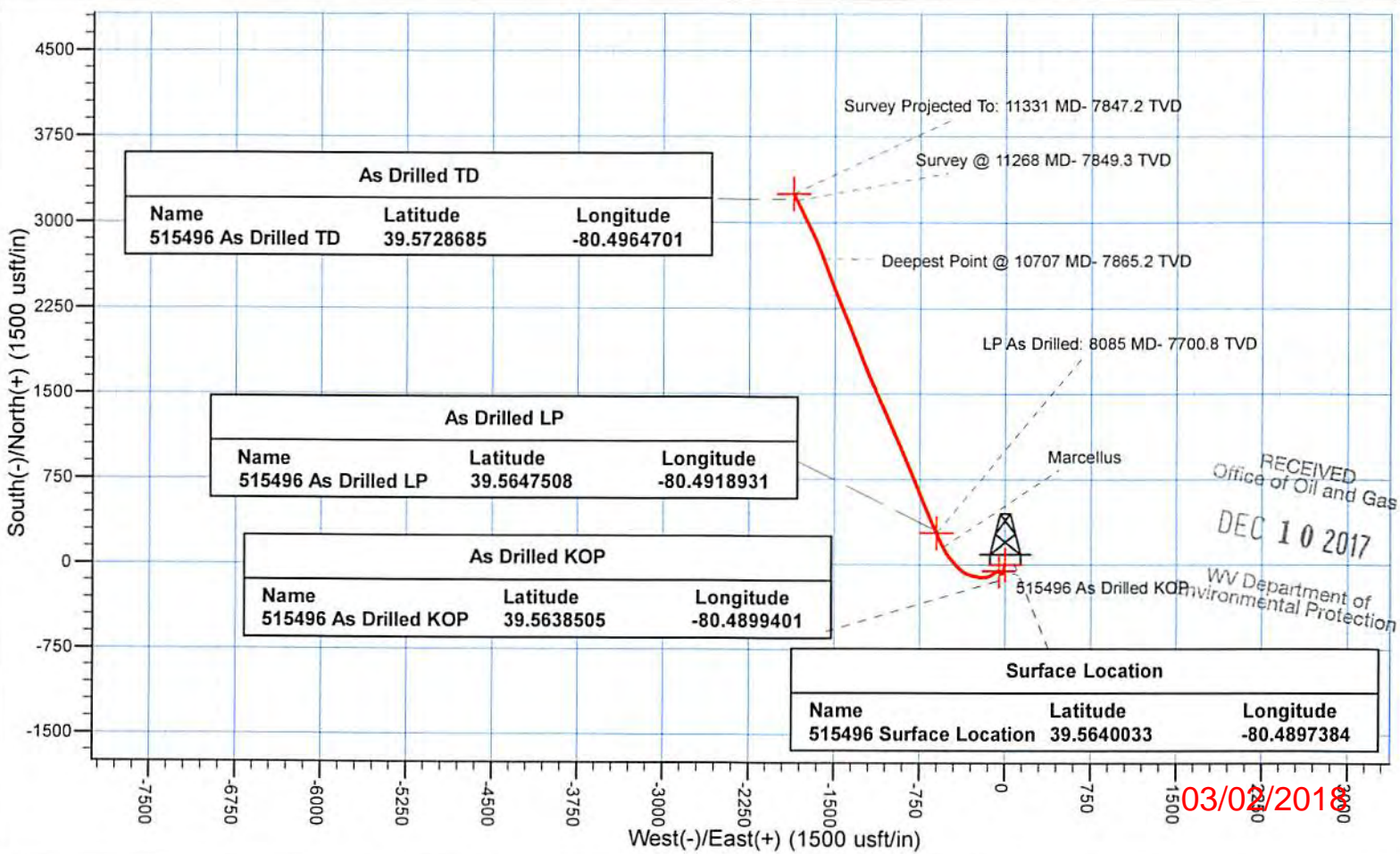
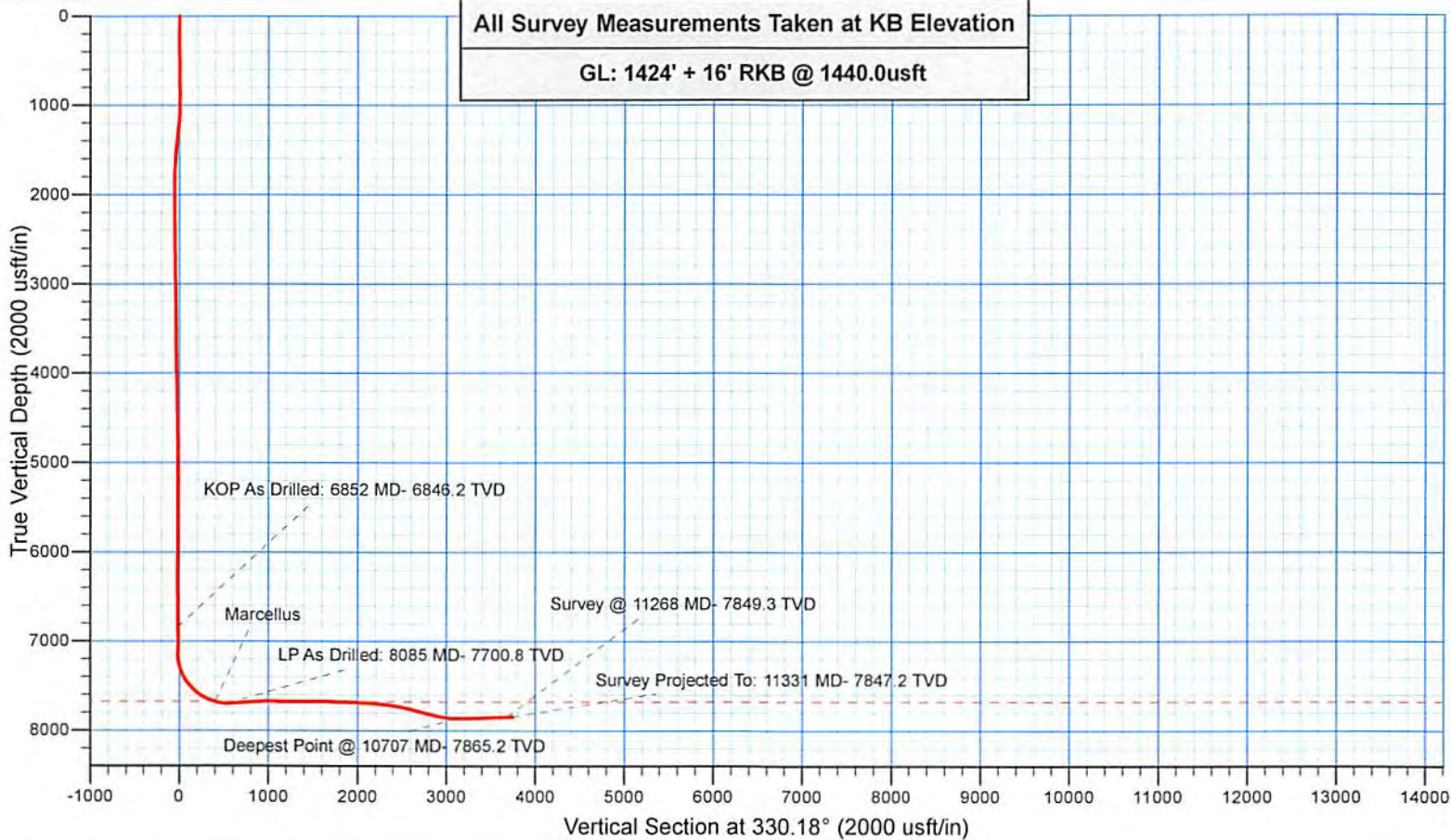
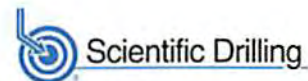




Where energy meets innovation.

Project: Marion County, WV
 Site: GLO76 Pad
 Well: #515496 - Marcellus
 Wellbore: Main Wellbore
 Design: 515496 As Drilled



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Where energy meets innovation.

EQT PRODUCTION

Marion County, WV

GLO76 Pad

#515496 - Marcellus - Slot 515496

Main Wellbore

Design: 515496 As Drilled

Standard Survey Report

17 August, 2017



Scientific Drilling

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| | | | |
|------------------|---------------------|-------------------------------------|--|
| Company: | EQT PRODUCTION | Local Co-ordinate Reference: | Well #515496 - Marcellus - Slot 515496 |
| Project: | Marion County, WV | TVD Reference: | GL: 1424' + 16' RKB @ 1440.0usft |
| Site: | GLO76 Pad | MD Reference: | GL: 1424' + 16' RKB @ 1440.0usft |
| Well: | #515496 - Marcellus | North Reference: | Grid |
| Wellbore: | Main Wellbore | Survey Calculation Method: | Minimum Curvature |
| Design: | 515496 As Drilled | Database: | Northeast District |

| | | | |
|--------------------|--------------------------------------|----------------------|----------------|
| Project | Marion County, WV | | |
| Map System: | US State Plane 1927 (Exact solution) | System Datum: | Mean Sea Level |
| Geo Datum: | NAD 1927 (NADCON CONUS) | | |
| Map Zone: | West Virginia North 4701 | | |

| | | | | | |
|------------------------------|-----------|---------------------|-------------------|--------------------------|-------------|
| Site | GLO76 Pad | | | | |
| Site Position: | | Northing: | 389,060.60 usft | Latitude: | 39.5639799 |
| From: | Map | Easting: | 1,721,015.30 usft | Longitude: | -80.4895816 |
| Position Uncertainty: | 0.0 usft | Slot Radius: | 13-3/16 " | Grid Convergence: | -0.63 ° |

| | | | | | | |
|-----------------------------|--|----------|----------------------------|-------------------|----------------------|--------------|
| Well | #515496 - Marcellus - Slot 515496, Verified by Pottmeyer on 7/6/2017 | | | | | |
| Well Position | +N/-S | 0.0 usft | Northing: | 389,069.60 usft | Latitude: | 39.5640033 |
| | +E/-W | 0.0 usft | Easting: | 1,720,971.20 usft | Longitude: | -80.4897383 |
| Position Uncertainty | | 0.0 usft | Wellhead Elevation: | usft | Ground Level: | 1,424.0 usft |

| | | | | | |
|------------------|-------------------|--------------------|------------------------|----------------------|----------------------------|
| Wellbore | Main Wellbore | | | | |
| Magnetics | Model Name | Sample Date | Declination (°) | Dip Angle (°) | Field Strength (nT) |
| | HDGM | 7/16/2017 | -8.65 | 66.88 | 52,345 |

| | | | | | |
|--------------------------|--------------------------------|---------------------|---------------------|----------------------|-----|
| Design | 515496 As Drilled | | | | |
| 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 | 330.18 | |

| | | | | | |
|-----------------------|------------------|-----------------------------------|------------------|-----------------------------------|--|
| Survey Program | Date 8/17/2017 | | | | |
| From (usft) | To (usft) | Survey (Wellbore) | Tool Name | Description | |
| 103.0 | 6,479.0 | Gyrodata Gyros (Main Wellbore) | GYD_DP_MS | Gyrodata gyro-compassing and drop | |
| 6,535.0 | 11,331.0 | Survey #2 SDI MWD (Main Wellbore) | SDI MWD | SDI MWD - Standard ver 1.0.1 | |

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| 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 |
| 103.0 | 0.27 | 317.46 | 103.0 | 0.2 | -0.2 | 0.2 | 0.26 | 0.26 | 0.00 |
| 203.0 | 0.15 | 289.66 | 203.0 | 0.4 | -0.4 | 0.6 | 0.15 | -0.12 | -27.80 |
| 303.0 | 0.15 | 265.93 | 303.0 | 0.4 | -0.7 | 0.7 | 0.06 | 0.00 | -23.73 |
| 403.0 | 0.23 | 283.70 | 403.0 | 0.5 | -1.0 | 0.9 | 0.10 | 0.08 | 17.77 |
| 503.0 | 0.42 | 304.69 | 503.0 | 0.7 | -1.5 | 1.4 | 0.22 | 0.19 | 20.99 |
| 603.0 | 0.61 | 309.38 | 603.0 | 1.3 | -2.2 | 2.2 | 0.19 | 0.19 | 4.69 |
| 703.0 | 0.71 | 309.91 | 703.0 | 2.0 | -3.1 | 3.3 | 0.10 | 0.10 | 0.53 |
| 803.0 | 0.69 | 313.86 | 803.0 | 2.8 | -4.0 | 4.5 | 0.05 | -0.02 | 3.95 |
| 903.0 | 0.71 | 315.11 | 903.0 | 3.7 | -4.9 | 5.6 | 0.03 | 0.02 | 1.25 |

| | | | |
|------------------|---------------------|-------------------------------------|--|
| Company: | EQT PRODUCTION | Local Co-ordinate Reference: | Well #515496 - Marcellus - Slot 515496 |
| Project: | Marion County, WV | TVD Reference: | GL: 1424' + 16' RKB @ 1440.0usft |
| Site: | GLO76 Pad | MD Reference: | GL: 1424' + 16' RKB @ 1440.0usft |
| Well: | #515496 - Marcellus | North Reference: | Grid |
| Wellbore: | Main Wellbore | Survey Calculation Method: | Minimum Curvature |
| Design: | 515496 As Drilled | Database: | Northeast District |

| 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) |
| 1,003.0 | 0.36 | 217.33 | 1,003.0 | 3.9 | -5.5 | 6.1 | 0.84 | -0.35 | -97.78 |
| 1,103.0 | 3.46 | 179.96 | 1,102.9 | 0.6 | -5.7 | 3.4 | 3.18 | 3.10 | -37.37 |
| 1,203.0 | 7.74 | 186.11 | 1,202.4 | -9.1 | -6.4 | -4.7 | 4.32 | 4.28 | 6.15 |
| 1,303.0 | 9.23 | 196.84 | 1,301.3 | -23.5 | -9.5 | -15.7 | 2.17 | 1.49 | 10.73 |
| 1,403.0 | 7.92 | 195.91 | 1,400.2 | -37.8 | -13.7 | -26.0 | 1.32 | -1.31 | -0.93 |
| 1,503.0 | 7.48 | 196.67 | 1,499.3 | -50.7 | -17.4 | -35.3 | 0.45 | -0.44 | 0.76 |
| 1,603.0 | 6.95 | 197.84 | 1,598.5 | -62.7 | -21.2 | -43.8 | 0.55 | -0.53 | 1.17 |
| 1,703.0 | 4.78 | 204.56 | 1,698.0 | -72.2 | -24.7 | -50.3 | 2.27 | -2.17 | 6.72 |
| 1,803.0 | 3.12 | 212.86 | 1,797.7 | -78.3 | -28.0 | -54.0 | 1.75 | -1.66 | 8.30 |
| 1,903.0 | 1.33 | 224.66 | 1,897.6 | -81.4 | -30.3 | -55.6 | 1.84 | -1.79 | 11.80 |
| 2,003.0 | 0.17 | 275.32 | 1,997.6 | -82.2 | -31.2 | -55.8 | 1.23 | -1.16 | 50.66 |
| 2,103.0 | 0.52 | 295.88 | 2,097.6 | -82.0 | -31.8 | -55.3 | 0.37 | 0.35 | 20.56 |
| 2,203.0 | 1.10 | 287.93 | 2,197.6 | -81.5 | -33.1 | -54.2 | 0.59 | 0.58 | -7.95 |
| 2,303.0 | 1.20 | 293.03 | 2,297.6 | -80.8 | -35.0 | -52.7 | 0.14 | 0.10 | 5.10 |
| 2,403.0 | 1.13 | 296.37 | 2,397.6 | -79.9 | -36.8 | -51.0 | 0.10 | -0.07 | 3.34 |
| 2,503.0 | 1.08 | 295.92 | 2,497.6 | -79.1 | -38.5 | -49.5 | 0.05 | -0.05 | -0.45 |
| 2,603.0 | 0.87 | 301.85 | 2,597.6 | -78.3 | -40.0 | -48.0 | 0.23 | -0.21 | 5.93 |
| 2,703.0 | 0.83 | 301.02 | 2,697.5 | -77.5 | -41.3 | -46.7 | 0.04 | -0.04 | -0.83 |
| 2,803.0 | 0.67 | 305.13 | 2,797.5 | -76.8 | -42.4 | -45.5 | 0.17 | -0.16 | 4.11 |
| 2,903.0 | 0.50 | 311.22 | 2,897.5 | -76.2 | -43.2 | -44.6 | 0.18 | -0.17 | 6.09 |
| 3,003.0 | 0.45 | 308.64 | 2,997.5 | -75.6 | -43.8 | -43.8 | 0.05 | -0.05 | -2.58 |
| 3,103.0 | 0.42 | 306.15 | 3,097.5 | -75.2 | -44.4 | -43.1 | 0.04 | -0.03 | -2.49 |
| 3,203.0 | 0.51 | 300.96 | 3,197.5 | -74.7 | -45.1 | -42.4 | 0.10 | 0.09 | -5.19 |
| 3,303.0 | 0.71 | 306.04 | 3,297.5 | -74.1 | -46.0 | -41.4 | 0.21 | 0.20 | 5.08 |
| 3,403.0 | 0.92 | 302.81 | 3,397.5 | -73.3 | -47.2 | -40.2 | 0.21 | 0.21 | -3.23 |
| 3,503.0 | 1.02 | 300.39 | 3,497.5 | -72.5 | -48.6 | -38.7 | 0.11 | 0.10 | -2.42 |
| 3,603.0 | 1.09 | 301.58 | 3,597.5 | -71.5 | -50.2 | -37.1 | 0.07 | 0.07 | 1.19 |
| 3,703.0 | 0.98 | 304.74 | 3,697.5 | -70.5 | -51.7 | -35.5 | 0.12 | -0.11 | 3.16 |
| 3,803.0 | 1.00 | 307.82 | 3,797.4 | -69.5 | -53.1 | -33.9 | 0.06 | 0.02 | 3.08 |
| 3,903.0 | 1.05 | 308.53 | 3,897.4 | -68.4 | -54.5 | -32.2 | 0.05 | 0.05 | 0.7 |
| 4,003.0 | 1.13 | 305.69 | 3,997.4 | -67.2 | -56.0 | -30.5 | 0.10 | 0.08 | -2.84 |
| 4,103.0 | 1.15 | 301.22 | 4,097.4 | -66.2 | -57.7 | -28.7 | 0.09 | 0.02 | -4.47 |
| 4,203.0 | 1.19 | 302.05 | 4,197.4 | -65.1 | -59.4 | -26.9 | 0.04 | -0.04 | 0.83 |
| 4,303.0 | 1.20 | 301.73 | 4,297.3 | -64.0 | -61.2 | -25.1 | 0.01 | 0.01 | -0.32 |
| 4,403.0 | 1.15 | 306.26 | 4,397.3 | -62.8 | -62.9 | -23.2 | 0.11 | -0.05 | 4.53 |
| 4,503.0 | 1.09 | 307.37 | 4,497.3 | -61.7 | -64.5 | -21.4 | 0.06 | -0.06 | 1.11 |
| 4,603.0 | 0.94 | 315.29 | 4,597.3 | -60.5 | -65.8 | -19.8 | 0.21 | -0.15 | 7.92 |
| 4,703.0 | 0.78 | 352.82 | 4,697.3 | -59.2 | -66.5 | -18.4 | 0.57 | -0.16 | 37.53 |
| 4,803.0 | 0.69 | 38.37 | 4,797.3 | -58.1 | -66.2 | -17.5 | 0.58 | -0.09 | 45.55 |
| 4,903.0 | 0.65 | 52.58 | 4,897.3 | -57.3 | -65.3 | -17.2 | 0.17 | -0.04 | 14.21 |
| 5,003.0 | 0.61 | 51.41 | 4,997.3 | -56.6 | -64.5 | -17.0 | 0.04 | -0.04 | -1.17 |
| 5,103.0 | 0.54 | 55.36 | 5,097.3 | -56.0 | -63.7 | -16.9 | 0.08 | -0.07 | 3.95 |
| 5,203.0 | 0.53 | 59.46 | 5,197.2 | -55.5 | -62.9 | -16.9 | 0.04 | -0.01 | 4.10 |

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|------------------|---------------------|-------------------------------------|--|
| Company: | EQT PRODUCTION | Local Co-ordinate Reference: | Well #515496 - Marcellus - Slot 515496 |
| Project: | Marion County, WV | TVD Reference: | GL: 1424' + 16' RKB @ 1440.0usft |
| Site: | GLO76 Pad | MD Reference: | GL: 1424' + 16' RKB @ 1440.0usft |
| Well: | #515496 - Marcellus | North Reference: | Grid |
| Wellbore: | Main Wellbore | Survey Calculation Method: | Minimum Curvature |
| Design: | 515496 As Drilled | Database: | Northeast District |

| 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) | |
| 9,826.0 | 83.98 | 339.31 | 7,708.9 | 1,879.2 | -1,283.6 | 2,268.7 | 0.94 | 0.43 | -0.84 | |
| 9,890.0 | 84.42 | 339.29 | 7,715.4 | 1,938.8 | -1,306.1 | 2,331.6 | 0.69 | 0.69 | -0.03 | |
| 9,952.0 | 81.75 | 337.81 | 7,722.9 | 1,996.1 | -1,328.6 | 2,392.5 | 4.92 | -4.31 | -2.39 | |
| 10,015.0 | 80.63 | 337.44 | 7,732.5 | 2,053.7 | -1,352.3 | 2,454.2 | 1.87 | -1.78 | -0.59 | |
| 10,079.0 | 78.42 | 338.36 | 7,744.1 | 2,112.0 | -1,376.0 | 2,516.6 | 3.73 | -3.45 | 1.44 | |
| 10,142.0 | 75.69 | 338.60 | 7,758.3 | 2,169.1 | -1,398.5 | 2,577.3 | 4.35 | -4.33 | 0.38 | |
| 10,205.0 | 75.52 | 338.24 | 7,773.9 | 2,225.8 | -1,421.0 | 2,637.7 | 0.62 | -0.27 | -0.57 | |
| 10,268.0 | 75.67 | 337.97 | 7,789.6 | 2,282.4 | -1,443.7 | 2,698.1 | 0.48 | 0.24 | -0.43 | |
| 10,330.0 | 75.76 | 337.54 | 7,804.9 | 2,338.0 | -1,466.5 | 2,757.7 | 0.69 | 0.15 | -0.69 | |
| 10,393.0 | 76.13 | 336.81 | 7,820.2 | 2,394.4 | -1,490.2 | 2,818.4 | 1.27 | 0.59 | -1.16 | |
| 10,456.0 | 77.41 | 340.02 | 7,834.6 | 2,451.4 | -1,512.7 | 2,879.0 | 5.36 | 2.03 | 5.10 | |
| 10,519.0 | 80.67 | 340.41 | 7,846.6 | 2,509.6 | -1,533.6 | 2,939.9 | 5.21 | 5.17 | 0.62 | |
| 10,581.0 | 82.74 | 339.44 | 7,855.5 | 2,567.2 | -1,554.7 | 3,000.4 | 3.68 | 3.34 | -1.56 | |
| 10,644.0 | 84.72 | 339.03 | 7,862.4 | 2,625.8 | -1,576.9 | 3,062.2 | 3.21 | 3.14 | -0.65 | |
| 10,707.0 | 90.27 | 340.07 | 7,865.2 | 2,684.7 | -1,598.9 | 3,124.3 | 8.95 | 8.81 | 1.65 | |
| Deepest Point @ 10707 MD- 7865.2 TVD | | | | | | | | | | |
| 10,770.0 | 90.70 | 338.92 | 7,864.6 | 2,743.7 | -1,621.0 | 3,186.5 | 1.95 | 0.68 | -1.83 | |
| 10,833.0 | 91.04 | 337.68 | 7,863.7 | 2,802.2 | -1,644.2 | 3,248.8 | 2.04 | 0.54 | -1.97 | |
| 10,896.0 | 92.62 | 334.21 | 7,861.7 | 2,859.7 | -1,669.9 | 3,311.5 | 6.05 | 2.51 | -5.51 | |
| 10,960.0 | 92.52 | 334.05 | 7,858.8 | 2,917.3 | -1,697.8 | 3,375.3 | 0.29 | -0.16 | -0.25 | |
| 11,023.0 | 91.44 | 334.37 | 7,856.6 | 2,973.9 | -1,725.2 | 3,438.1 | 1.79 | -1.71 | 0.51 | |
| 11,087.0 | 91.54 | 334.58 | 7,855.0 | 3,031.7 | -1,752.8 | 3,501.9 | 0.36 | 0.16 | 0.33 | |
| 11,150.0 | 91.81 | 333.60 | 7,853.1 | 3,088.3 | -1,780.3 | 3,564.7 | 1.61 | 0.43 | -1.56 | |
| 11,214.0 | 91.85 | 333.28 | 7,851.1 | 3,145.5 | -1,808.9 | 3,628.6 | 0.50 | 0.06 | -0.50 | |
| 11,268.0 | 91.91 | 332.96 | 7,849.3 | 3,193.7 | -1,833.3 | 3,682.5 | 0.60 | 0.11 | -0.59 | |
| Survey @ 11268 MD- 7849.3 TVD | | | | | | | | | | |
| 11,331.0 | 91.91 | 332.96 | 7,847.2 | 3,249.8 | -1,861.9 | 3,745.3 | 0.00 | 0.00 | 0.00 | |
| Survey Projected To: 11331 MD- 7847.2 TVD | | | | | | | | | | |

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|-----------------------------------|--|
| Company: EQT PRODUCTION | Local Co-ordinate Reference: Well #515496 - Marcellus - Slot 515496 |
| Project: Marion County, WV | TVD Reference: GL: 1424' + 16' RKB @ 1440.0usft |
| Site: GLO76 Pad | MD Reference: GL: 1424' + 16' RKB @ 1440.0usft |
| Well: #515496 - Marcellus | North Reference: Grid |
| Wellbore: Main Wellbore | Survey Calculation Method: Minimum Curvature |
| Design: 515496 As Drilled | Database: Northeast District |

| Design Targets | | | | | | | | | |
|--|---------------|--------------|------------|--------------|--------------|-----------------|----------------|------------|-------------|
| Target Name | Dip Angle (°) | Dip Dir. (°) | TVD (usft) | +N/-S (usft) | +E/-W (usft) | Northing (usft) | Easting (usft) | Latitude | Longitude |
| 515496 Surface Location - hit/miss target - Shape - Point | 0.00 | 360.00 | 0.0 | 0.0 | 0.0 | 389,069.60 | 1,720,971.20 | 39.5640033 | -80.4897383 |
| 515496 As Drilled KOP - actual wellpath hits target center - Point | 0.00 | 0.00 | 6,846.2 | -55.0 | -57.5 | 389,014.59 | 1,720,913.70 | 39.5638505 | -80.4899401 |
| 515496 As Drilled LP - actual wellpath hits target center - Point | 0.00 | 0.00 | 7,700.8 | 279.0 | -604.4 | 389,348.56 | 1,720,366.77 | 39.5647509 | -80.4918930 |
| 515496 As Drilled TD - actual wellpath hits target center - Point | 0.00 | 0.00 | 7,847.2 | 3,249.8 | -1,861.9 | 392,319.38 | 1,719,109.28 | 39.5728686 | -80.4964700 |

| Design Annotations | | | | | |
|-----------------------|-----------------------|-------------------|--------------|---|--|
| Measured Depth (usft) | Vertical Depth (usft) | Local Coordinates | | Comment | |
| | | +N/-S (usft) | +E/-W (usft) | | |
| 6,852.0 | 6,846.2 | -55.0 | -57.5 | KOP As Drilled: 6852 MD- 6846.2 TVD | |
| 8,085.0 | 7,700.8 | 279.0 | -604.4 | LP As Drilled: 8085 MD- 7700.8 TVD | |
| 10,707.0 | 7,865.2 | 2,684.7 | -1,598.9 | Deepest Point @ 10707 MD- 7865.2 TVD | |
| 11,268.0 | 7,849.3 | 3,193.7 | -1,833.3 | Survey @ 11268 MD- 7849.3 TVD | |
| 11,331.0 | 7,847.2 | 3,249.8 | -1,861.9 | Survey Projected To: 11331 MD- 7847.2 TVD | |

Checked By: _____ Approved By: _____ Date: _____

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