

Bill Barrett Corp. (III)

Garfield County, Colorado [NAD83]

Kaufman Pad #3

GGU Kaufman 11A-30-691 - Slot 11A

Wellbore #1

Design: Wellbore #1

Standard Survey Report

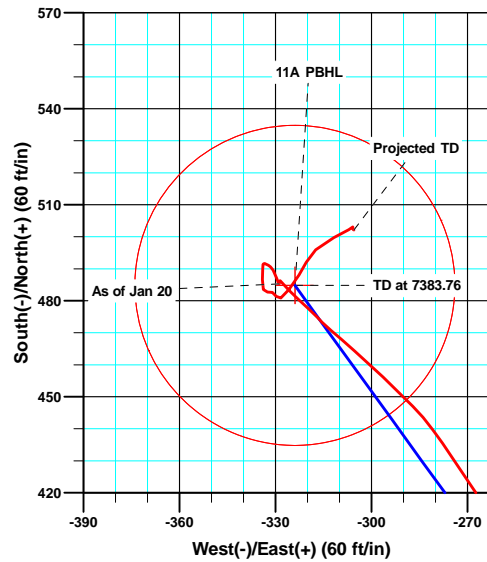
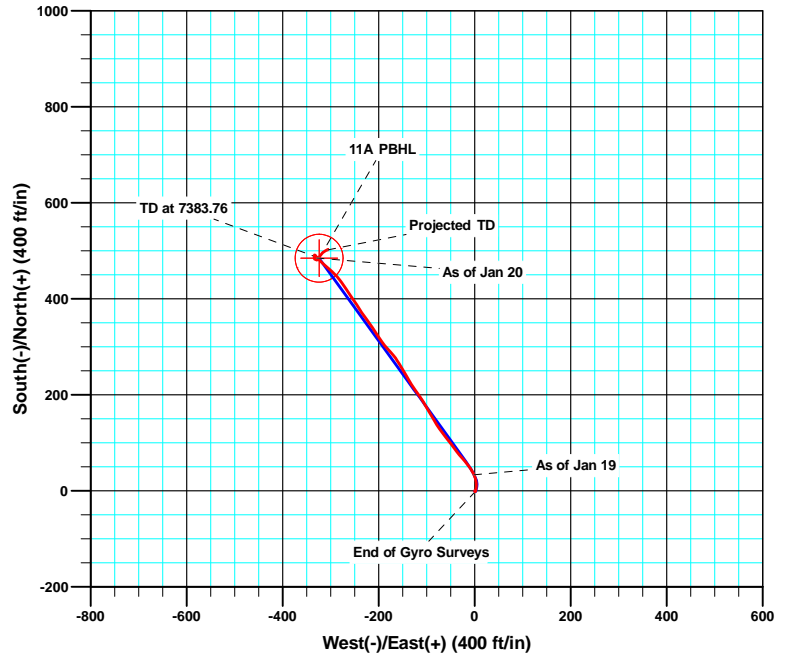
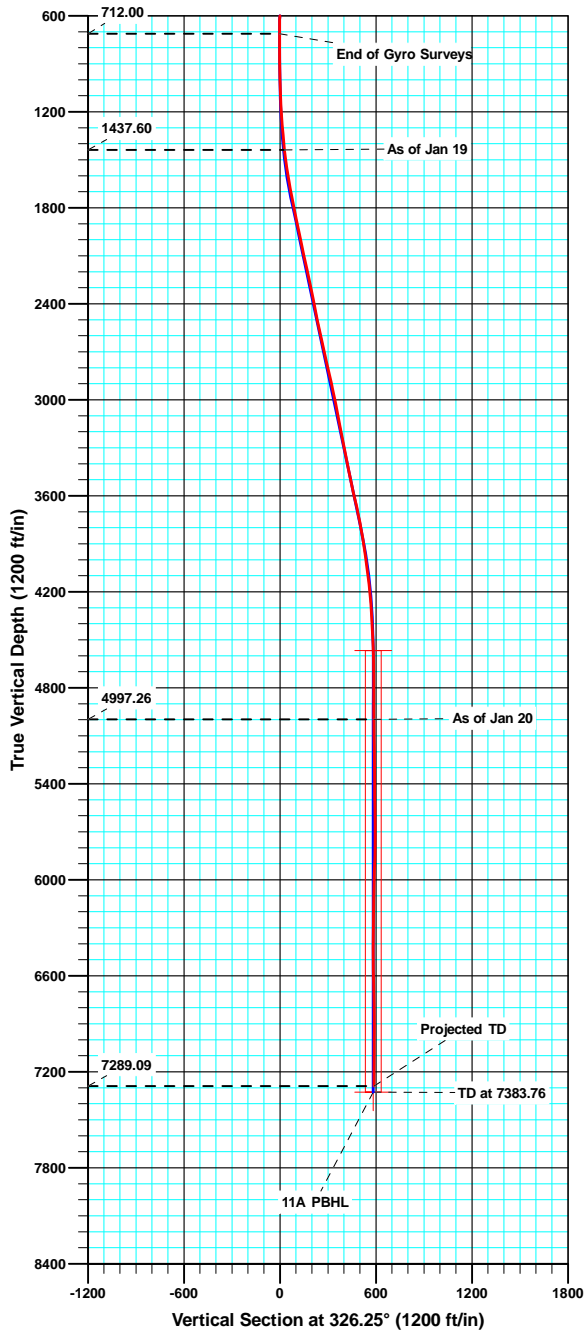
23 January, 2012

WELL DETAILS: GGU Kaufman 11A-30-691

US State Plane 1983 North American Datum 1983 Colorado Central Zone

+N/-S +E/-W Northing Easting Latitude Longitude
 0.00 0.00 1614303.62 2406742.87 39° 30' 4.29 N 107° 36' 9.35 W

KB @ 5835.01 Kaufman Pad #3



T
 Azimuths to True North
 Magnetic North: 10.13°
 Magnetic Field
 Strength: 52272.5snT
 Dip Angle: 65.81°
 Date: 10/11/2011
 Model: IGRF2010

ANNOTATIONS

TVD	MD	Inc	Azi	+N/-S	+E/-W	Vsect	Departure	Annotation
712.00	712.00	0.250	127.14	-0.61	1.76	-1.49	2.11	End of Gyro Surveys
1437.60	1439.00	6.200	337.20	33.62	-1.41	28.74	39.59	As of Jan 19
4997.26	5052.00	0.500	161.80	485.23	-328.91	586.19	601.91	As of Jan 20
7289.09	7345.00	0.400	132.80	502.08	-305.48	587.18	661.36	Projected TD

Sharewell Survey Report

Company: Bill Barrett Corp. (III)	Local Co-ordinate Reference: Well GGU Kaufman 11A-30-691 - Slot 11A
Project: Garfield County, Colorado [NAD83]	TVD Reference: KB @ 5858.01ft (KB=23')
Site: Kaufman Pad #3	MD Reference: KB @ 5858.01ft (KB=23')
Well: GGU Kaufman 11A-30-691	North Reference: True
Wellbore: Wellbore #1	Survey Calculation Method: Minimum Curvature
Design: Wellbore #1	Database: CompassVM

Project Garfield County, Colorado [NAD83]		
Map System: US State Plane 1983	System Datum:	Mean Sea Level
Geo Datum: North American Datum 1983		
Map Zone: Colorado Central Zone		

Site Kaufman Pad #3		
Site Position:	Northing: 1,614,303.61 usft	Latitude: 39° 30' 4.29 N
From: Lat/Long	Easting: 2,406,742.88 usft	Longitude: 107° 36' 9.35 W
Position Uncertainty: 0.00 ft	Slot Radius: 1.10 ft	Grid Convergence: -1.33 °

Well GGU Kaufman 11A-30-691 - Slot 11A		
Well Position +N/-S 0.00 ft	Northing: 1,614,303.61 usft	Latitude: 39° 30' 4.29 N
+E/-W 0.00 ft	Easting: 2,406,742.88 usft	Longitude: 107° 36' 9.35 W
Position Uncertainty 0.00 ft	Wellhead Elevation: ft	Ground Level: 5,835.01 ft

Wellbore Wellbore #1					
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2010	10/11/2011	10.13	65.81	52,273

Design Wellbore #1				
Audit Notes:				
Version: 1.0	Phase: ACTUAL	Tie On Depth:	0.00	
Vertical Section:	Depth From (TVD) (ft)	+N/-S (ft)	+E/-W (ft)	Direction (°)
	0.00	0.00	0.00	326.25

Survey Program		Date 1/23/2012		
From (ft)	To (ft)	Survey (Wellbore)	Tool Name	Description
23.00	712.00	Survey #1 Gyro (Wellbore #1)	NS-GYRO-MS	North sensing gyrocompassing m/s
779.00	7,345.00	MWD (Wellbore #1)	MWD	MWD - Standard

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
23.00	0.000	0.00	23.00	0.00	0.00	0.00	0.00	0.00	0.00
123.00	0.180	128.11	123.00	-0.10	0.12	-0.15	0.18	0.18	0.00
223.00	0.250	109.19	223.00	-0.27	0.45	-0.47	0.10	0.07	-18.92
323.00	0.320	65.71	323.00	-0.22	0.91	-0.69	0.22	0.07	-43.48
423.00	0.100	120.24	423.00	-0.15	1.24	-0.82	0.27	-0.22	54.53
523.00	0.160	125.44	523.00	-0.28	1.43	-1.03	0.06	0.06	5.20
623.00	0.090	156.90	623.00	-0.43	1.58	-1.23	0.10	-0.07	31.46
712.00	0.250	127.14	712.00	-0.61	1.76	-1.49	0.20	0.18	-33.44
779.00	0.400	243.80	779.00	-0.80	1.67	-1.59	0.83	0.22	174.12

Sharewell

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Site:	Kaufman Pad #3	MD Reference:	KB @ 5858.01ft (KB=23')
Well:	GGU Kaufman 11A-30-691	North Reference:	True
Wellbore:	Wellbore #1	Survey Calculation Method:	Minimum Curvature
Design:	Wellbore #1	Database:	CompassVM

Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
871.00	0.300	172.70	870.99	-1.18	1.41	-1.77	0.45	-0.11	-77.28
963.00	2.000	19.10	962.98	0.09	1.96	-1.01	2.47	1.85	-166.96
1,058.00	2.400	11.70	1,057.91	3.61	2.91	1.38	0.52	0.42	-7.79
1,153.00	4.600	358.80	1,152.73	9.37	3.23	5.99	2.45	2.32	-13.58
1,248.00	4.200	5.10	1,247.45	16.64	3.46	11.91	0.66	-0.42	6.63
1,344.00	5.600	339.90	1,343.10	24.54	2.17	19.20	2.64	1.46	-26.25
1,439.00	6.200	337.20	1,437.60	33.62	-1.41	28.74	0.70	0.63	-2.84
1,534.00	7.800	328.70	1,531.89	43.86	-6.75	40.22	2.00	1.68	-8.95
1,629.00	9.600	320.50	1,625.80	55.48	-15.14	54.55	2.30	1.89	-8.63
1,724.00	10.600	318.30	1,719.33	68.12	-25.99	71.08	1.13	1.05	-2.32
1,819.00	12.000	322.70	1,812.48	82.50	-37.79	89.59	1.73	1.47	4.63
1,914.00	11.900	323.60	1,905.42	98.24	-49.59	109.23	0.22	-0.11	0.95
2,009.00	11.800	322.80	1,998.40	113.86	-61.27	128.71	0.20	-0.11	-0.84
2,104.00	12.000	323.20	2,091.36	129.51	-73.06	148.27	0.23	0.21	0.42
2,199.00	12.400	331.00	2,184.22	146.34	-83.92	168.30	1.78	0.42	8.21
2,295.00	12.000	329.40	2,278.05	163.94	-94.00	188.54	0.55	-0.42	-1.67
2,390.00	11.600	328.00	2,371.04	180.54	-104.09	207.94	0.52	-0.42	-1.47
2,485.00	11.300	327.10	2,464.15	196.46	-114.21	226.80	0.37	-0.32	-0.95
2,580.00	11.000	323.70	2,557.36	211.58	-124.63	245.16	0.76	-0.32	-3.58
2,675.00	13.300	329.30	2,650.23	228.28	-135.57	265.13	2.72	2.42	5.89
2,770.00	12.700	330.10	2,742.79	246.73	-146.36	286.46	0.66	-0.63	0.84
2,865.00	13.200	329.20	2,835.38	265.10	-157.12	307.71	0.57	0.53	-0.95
2,960.00	12.000	321.40	2,928.10	282.14	-168.83	328.39	2.19	-1.26	-8.21
3,055.00	11.000	316.20	3,021.19	296.40	-181.27	347.15	1.52	-1.05	-5.47
3,150.00	11.200	324.90	3,114.42	310.49	-192.85	365.30	1.77	0.21	9.16
3,246.00	10.300	326.50	3,208.73	325.27	-202.95	383.21	0.99	-0.94	1.67
3,341.00	12.000	326.00	3,301.94	340.54	-213.16	401.58	1.79	1.79	-0.53
3,436.00	11.500	323.50	3,394.95	356.34	-224.31	420.91	0.75	-0.53	-2.63
3,531.00	11.000	326.30	3,488.12	371.50	-234.98	439.43	0.78	-0.53	2.95
3,626.00	13.300	327.20	3,580.99	388.22	-245.92	459.42	2.43	2.42	0.95
3,721.00	12.300	325.30	3,673.63	405.73	-257.61	480.47	1.14	-1.05	-2.00
3,816.00	10.800	326.10	3,766.70	421.44	-268.33	499.49	1.59	-1.58	0.84
3,911.00	9.700	325.80	3,860.18	435.44	-277.79	516.39	1.16	-1.16	-0.32
4,006.00	8.300	316.10	3,954.02	447.01	-287.05	531.15	2.17	-1.47	-10.21
4,101.00	7.500	312.50	4,048.11	456.13	-296.37	543.92	0.99	-0.84	-3.79
4,197.00	6.900	312.30	4,143.36	464.25	-305.26	555.60	0.63	-0.63	-0.21
4,292.00	5.000	309.90	4,237.84	470.75	-312.66	565.11	2.02	-2.00	-2.53
4,387.00	3.600	318.30	4,332.57	475.63	-317.82	572.04	1.61	-1.47	8.84
4,482.00	2.700	308.20	4,427.43	479.24	-321.56	577.12	1.11	-0.95	-10.63
4,577.00	2.500	318.70	4,522.33	482.18	-324.68	581.30	0.54	-0.21	11.05
4,672.00	1.000	309.80	4,617.28	484.27	-326.69	584.15	1.60	-1.58	-9.37
4,767.00	1.000	323.30	4,712.27	485.46	-327.82	585.77	0.25	0.00	14.21
4,862.00	0.300	302.20	4,807.26	486.26	-328.53	586.83	0.77	-0.74	-22.21

Sharewell

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Wellbore:	Wellbore #1	Survey Calculation Method:	Minimum Curvature
Design:	Wellbore #1	Database:	CompassVM

Survey										
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)	
4,957.00	0.500	201.60	4,902.26	486.01	-328.89	586.82	0.66	0.21	-105.89	
5,052.00	0.500	161.80	4,997.26	485.23	-328.91	586.19	0.36	0.00	-41.89	
5,148.00	2.000	337.70	5,093.24	486.38	-329.42	587.42	2.60	1.56	183.23	
5,243.00	0.800	346.70	5,188.21	488.56	-330.20	589.67	1.28	-1.26	9.47	
5,338.00	0.700	307.80	5,283.20	489.56	-330.81	590.84	0.54	-0.11	-40.95	
5,433.00	0.600	339.20	5,378.20	490.38	-331.45	591.88	0.38	-0.11	33.05	
5,528.00	0.200	287.70	5,473.20	490.90	-331.78	592.49	0.53	-0.42	-54.21	
5,623.00	0.900	296.50	5,568.19	491.28	-332.61	593.27	0.74	0.74	9.26	
5,718.00	0.200	293.30	5,663.19	491.68	-333.43	594.06	0.74	-0.74	-3.37	
5,813.00	0.500	222.70	5,758.18	491.44	-333.86	594.10	0.50	0.32	-74.32	
5,908.00	1.400	172.40	5,853.17	489.98	-333.99	592.96	1.21	0.95	-52.95	
6,004.00	2.600	187.10	5,949.11	486.66	-334.10	590.26	1.35	1.25	15.31	
6,099.00	1.400	152.20	6,044.06	483.49	-333.83	587.48	1.75	-1.26	-36.74	
6,194.00	1.000	71.30	6,139.04	482.73	-332.50	586.11	1.67	-0.42	-85.16	
6,289.00	1.000	118.60	6,234.03	482.60	-330.99	585.16	0.84	0.00	49.79	
6,384.00	1.200	147.70	6,329.01	481.37	-329.73	583.43	0.62	0.21	30.63	
6,479.00	1.100	69.20	6,424.00	480.85	-328.34	582.23	1.53	-0.11	-82.63	
6,574.00	3.500	36.80	6,518.92	483.49	-325.75	582.99	2.78	2.53	-34.11	
6,669.00	3.200	31.30	6,613.75	488.08	-322.64	585.07	0.46	-0.32	-5.79	
6,764.00	2.300	28.10	6,708.64	492.03	-320.36	587.09	0.96	-0.95	-3.37	
6,859.00	3.600	42.60	6,803.52	495.91	-317.45	588.70	1.57	1.37	15.26	
6,955.00	4.700	66.30	6,899.27	499.71	-311.80	588.72	2.10	1.15	24.69	
7,050.00	1.800	50.30	6,994.11	502.22	-307.09	588.20	3.17	-3.05	-16.84	
7,145.00	0.200	134.80	7,089.09	503.06	-305.83	588.19	1.89	-1.68	88.95	
7,240.00	0.400	199.10	7,184.09	502.63	-305.82	587.82	0.38	0.21	67.68	
7,295.00	0.400	132.80	7,239.09	502.32	-305.74	587.52	0.80	0.00	-120.55	
7,345.00	0.400	132.80	7,289.09	502.08	-305.48	587.18	0.00	0.00	0.00	

Design Annotations					
Measured Depth (ft)	Vertical Depth (ft)	Local Coordinates		Comment	
		+N/-S (ft)	+E/-W (ft)		
712.00	712.00	-0.61	1.76	End of Gyro Surveys	
1,439.00	1,437.60	33.62	-1.41	As of Jan 19	
5,052.00	4,997.26	485.23	-328.91	As of Jan 20	
7,345.00	7,289.09	502.08	-305.48	Projected TD	

Checked By: _____ Approved By: _____ Date: _____