



Company: MEWBOURNE
Lease/Well: BRUSHY DRAW 1 FED/#1H

Rig Name: PATTERSON 46
State/County: NEW MEXICO/EDDY

Latitude: 32.05
GRID North is 0.41 Degrees East of True North
VS-Azi: 268.86 Degrees



30-015-38673

Depth Reference : RKB 20 FEET

DRILLOG HA GYRO SURVEY CALCULATIONS

Filename: brushy draw 1 fed#1h_ed.ut

Minimum Curvature Method

Report Date/Time: 6/24/2011 / 15:32

Vaughn Energy Services
Woodward, OK
(580) 254-5000

Surveyor: Justin Everett
Brushy Draw 1 Fed #1H

Measured Depth FT	Incl Angle Deg	Drift Direction Deg	TVD FT	+N/-S FT	+E/-W FT	Vertical Section FT	Closure Distance FT	Closure Direction Deg	Dogleg Severity Deg/100
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	****
100.00	0.35	206.52	100.00	-0.28	-0.14	0.14	0.31	206.52	0.35
200.00	0.58	186.60	200.00	-1.05	-0.33	0.36	1.11	197.59	0.27
300.00	0.88	168.26	299.99	-2.31	-0.24	0.28	2.32	185.83	0.38
400.00	1.21	167.59	399.97	-4.10	0.15	-0.07	4.10	177.92	0.33
500.00	1.53	167.79	499.94	-6.44	0.66	-0.53	6.47	174.16	0.32
600.00	2.20	165.93	599.89	-9.61	1.41	-1.22	9.71	171.66	0.67
700.00	3.23	170.94	699.78	-14.25	2.32	-2.03	14.44	170.76	1.06
800.00	3.88	178.47	799.58	-20.41	2.85	-2.45	20.61	172.05	0.80
900.00	3.89	180.23	899.35	-27.18	2.93	-2.39	27.34	173.85	0.12
1000.00	3.22	181.98	999.16	-33.39	2.82	-2.15	33.50	175.18	0.68
1100.00	2.97	182.59	1099.01	-38.78	2.60	-1.83	38.87	176.16	0.26
1200.00	2.80	183.44	1198.89	-43.81	2.34	-1.47	43.87	176.94	0.17
1300.00	2.55	182.00	1298.78	-48.47	2.12	-1.15	48.52	177.50	0.26
1400.00	2.27	183.71	1398.69	-52.67	1.91	-0.86	52.71	177.92	0.28
1500.00	1.57	180.83	1498.63	-56.02	1.76	-0.65	56.05	178.20	0.71
1600.00	1.04	171.97	1598.61	-58.29	1.87	-0.71	58.32	178.16	0.57
1700.00	0.98	170.39	1698.59	-60.03	2.14	-0.94	60.06	177.96	0.07
1800.00	0.78	190.11	1798.58	-61.54	2.16	-0.94	61.58	177.99	0.36

Measured Depth FT	Incl Angle Deg	Drift Direction Deg	TVD FT	+N/-S FT	+E/-W FT	Vertical Section FT	Closure Distance FT	Closure Direction Deg	Dogleg Severity Deg/100
1900.00	0.73	204.58	1898.57	-62.78	1.78	-0.53	62.81	178.38	0.20
2000.00	0.81	235.73	1998.56	-63.76	0.93	0.34	63.77	179.17	0.42
2100.00	0.97	263.37	2098.55	-64.26	-0.49	1.77	64.26	180.44	0.45
2200.00	1.13	287.40	2198.53	-64.06	-2.27	3.54	64.10	182.03	0.46
2300.00	1.13	282.49	2298.52	-63.55	-4.17	5.44	63.69	183.76	0.10
2400.00	1.12	270.60	2398.50	-63.33	-6.11	7.37	63.62	185.51	0.23
2500.00	1.63	267.96	2498.47	-63.37	-8.51	9.77	63.94	187.65	0.52
2600.00	2.04	254.56	2598.42	-63.89	-11.65	12.92	64.95	190.33	0.59
2700.00	2.74	244.82	2698.33	-65.38	-15.53	16.83	67.20	193.36	0.80
2800.00	2.92	246.25	2798.21	-67.43	-20.02	21.36	70.34	196.54	0.20
2900.00	1.53	240.47	2898.13	-69.11	-23.52	24.89	73.00	198.79	1.41
3000.00	0.42	292.09	2998.11	-69.63	-25.01	26.40	73.98	199.76	1.31
3100.00	0.62	334.23	3098.11	-69.00	-25.59	26.96	73.59	200.35	0.42
3200.00	0.86	339.71	3198.10	-67.81	-26.09	27.43	72.66	201.04	0.25
3300.00	0.33	337.04	3298.10	-66.84	-26.46	27.78	71.89	201.60	0.53
3400.00	0.11	348.62	3398.10	-66.48	-26.59	27.91	71.60	201.80	0.22
3500.00	0.19	13.82	3498.10	-66.22	-26.57	27.88	71.36	201.86	0.10
3600.00	0.17	28.77	3598.09	-65.94	-26.46	27.77	71.05	201.87	0.05
3700.00	0.09	48.93	3698.09	-65.76	-26.33	27.63	70.83	201.82	0.08
3800.00	0.15	37.74	3798.09	-65.60	-26.19	27.49	70.63	201.76	0.07
3900.00	0.17	15.52	3898.09	-65.35	-26.06	27.36	70.35	201.75	0.07
4000.00	0.43	5.59	3998.09	-64.83	-25.99	27.27	69.84	201.84	0.26
4100.00	0.71	18.97	4098.09	-63.87	-25.75	27.01	68.86	201.96	0.31
4200.00	0.88	16.74	4198.08	-62.54	-25.33	26.56	67.48	202.04	0.17
4300.00	0.79	3.23	4298.07	-61.12	-25.07	26.28	66.06	202.30	0.21
4400.00	0.68	344.18	4398.06	-59.86	-25.19	26.37	64.94	202.82	0.27
4500.00	0.77	331.53	4498.05	-58.70	-25.67	26.83	64.07	203.62	0.18
4600.00	0.75	325.85	4598.04	-57.57	-26.35	27.49	63.32	204.60	0.08
4700.00	0.95	322.19	4698.03	-56.37	-27.23	28.35	62.61	205.78	0.21
4800.00	0.81	312.54	4798.02	-55.24	-28.26	29.36	62.05	207.10	0.21
4900.00	0.69	309.73	4898.01	-54.38	-29.24	30.32	61.74	208.27	0.13
5000.00	0.56	295.36	4998.00	-53.79	-30.14	31.21	61.66	209.27	0.20
5100.00	0.60	290.15	5098.00	-53.40	-31.07	32.13	61.78	210.19	0.07
5200.00	0.65	284.98	5197.99	-53.07	-32.11	33.15	62.03	211.17	0.07
5300.00	0.53	282.36	5297.99	-52.83	-33.11	34.15	62.34	212.07	0.12
5400.00	0.80	274.72	5397.98	-52.67	-34.26	35.30	62.83	213.04	0.28
5500.00	0.85	270.61	5497.97	-52.61	-35.69	36.73	63.57	214.16	0.08
5600.00	0.85	266.46	5597.96	-52.64	-37.18	38.22	64.46	215.23	0.06
5700.00	0.98	260.68	5697.95	-52.83	-38.77	39.81	65.53	216.27	0.16

Measured Depth FT	Incl Angle Deg	Drift Direction Deg	TVD FT	+N/-S FT	+E/-W FT	Vertical Section FT	Closure Distance FT	Closure Direction Deg	Dogleg Severity Deg/100
5800.00	1.20	257.10	5797.93	-53.20	-40.63	41.68	66.94	217.37	0.23
5900.00	1.03	255.78	5897.91	-53.65	-42.53	43.58	68.46	218.40	0.17
6000.00	0.82	253.60	5997.90	-54.08	-44.08	45.15	69.77	219.19	0.22
6100.00	0.92	248.99	6097.89	-54.57	-45.52	46.59	71.06	219.83	0.13
6200.00	0.72	240.61	6197.88	-55.16	-46.81	47.90	72.35	220.32	0.24
6300.00	0.35	224.64	6297.87	-55.69	-47.58	48.68	73.25	220.51	0.39
6400.00	0.23	191.20	6397.87	-56.11	-47.83	48.94	73.73	220.45	0.21
6500.00	0.27	182.83	6497.87	-56.54	-47.89	49.00	74.09	220.26	0.05
6600.00	0.34	176.85	6597.87	-57.07	-47.88	49.01	74.49	220.00	0.08
6700.00	0.46	169.00	6697.87	-57.76	-47.79	48.93	74.96	219.60	0.13
6800.00	0.63	171.75	6797.86	-58.70	-47.63	48.79	75.59	219.06	0.18
6900.00	0.85	179.12	6897.85	-59.99	-47.54	48.73	76.54	218.40	0.24
7000.00	1.09	187.21	6997.84	-61.68	-47.65	48.87	77.94	217.69	0.28
7100.00	1.16	198.84	7097.82	-63.59	-48.10	49.35	79.73	217.10	0.24
7164.00	0.84	219.75	7161.81	-64.57	-48.61	49.88	80.82	216.97	0.75

