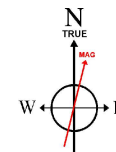


# WARD PETROLEUM CORPORATION

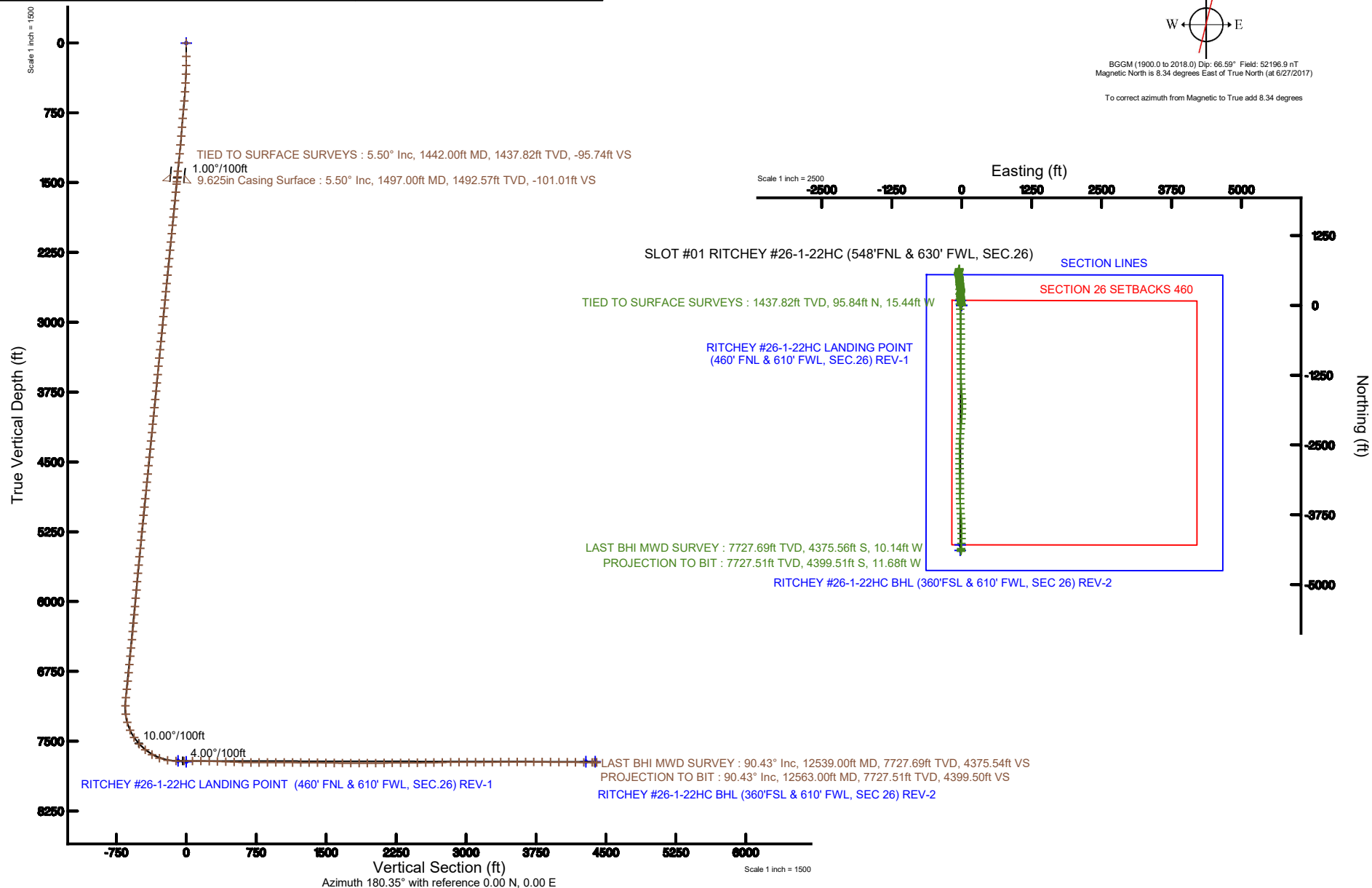
Location: COLORADO Slot: SLOT #01 RITCHEY #26-1-22HC (548'FNL & 630' FWL, SEC.26)  
Field: WELD COUNTY Well: RITCHEY #26-1-22HC  
Facility: SEC.26-T1N-R66W Wellbore: RITCHEY #26-1-22HC PWB

Plot reference wellpath is RITCHEY #26-1-22HC (REV-A.1) PWB	Grid System: NAD83 / Lambert Colorado SP, Northern Zone (501), US feet
True vertical depths are referenced to PRECISION 460 (20' KB) (RKB)	* = Wellpath was transformed from a different geodetic datum
Measured depths are referenced to PRECISION 460 (20' KB) (RKB)	North Reference: True north
PRECISION 460 (20' KB) (RKB) to Mean Sea Level: 5174 feet	Scale: True distance
Mean Sea Level to Ground level (At Slot: SLOT #01 RITCHEY #26-1-22HC (548'FNL & 630' FWL, SEC.26) ): 0 feet	Depths are in feet
Coordinates are in feet referenced to Slot	Created by: doddanna on 2018-02-26
	Database: WellArchitectDB



BGGM (1900.0 to 2018.0) Dip: 66.59° Field: 52196.9 nT  
Magnetic North is 8.34 degrees East of True North (at 6/27/2017)

To correct azimuth from Magnetic to True add 8.34 degrees



**Company:** Baker Hughes Incorporated  
**Customer/Operator:** Ward Petroleum  
**Date Range:** 7/10/2017 - 7/12/2017  
**Rig Name:** PD 460  
**Rig Elv/Dat:** 5174.00 (ft) / MSL  
**Well:** Ritchey 26-1-22HC  
**Wellbore:** Ritchey 26-1-22HC



Tie/ Proj	Measured Depth (ft)	Inclination (deg)	Azimuth (deg)	Temperature(degF)	True Vertical Depth(ft)	Northing(ft)	Easting(ft)	DLS(deg/100ft)	Vertical Section(ft)
Tie	2.00	0.00	171.70		2.00	0.00	0.00	0.00	0.00
	146.00	0.20	171.70		146.00	-0.25	0.04	0.14	0.25
	242.00	1.20	323.90		241.99	0.40	-0.53	1.44	-0.39
	337.00	2.60	332.80		336.94	3.12	-2.10	1.50	-3.11
	432.00	3.60	337.20		431.80	7.78	-4.24	1.08	-7.76
	527.00	4.30	354.60		526.58	14.08	-5.73	1.45	-14.04
	623.00	4.90	351.10		622.27	21.71	-6.71	0.69	-21.67
	718.00	5.70	355.30		716.86	30.42	-7.72	0.94	-30.38
	813.00	5.00	354.10		811.45	39.24	-8.53	0.75	-39.19
	908.00	4.10	350.20		906.15	46.71	-9.54	1.00	-46.65
	1003.00	4.60	353.80		1000.87	53.84	-10.53	0.60	-53.78
	1098.00	5.30	353.10		1095.52	61.99	-11.47	0.74	-61.91
	1193.00	5.60	351.30		1190.09	70.92	-12.69	0.36	-70.84
	1289.00	6.10	353.40		1285.59	80.62	-13.99	0.57	-80.53
	1384.00	5.60	354.50		1380.09	90.25	-15.01	0.54	-90.15
	1442.00	5.50	356.70		1437.82	95.84	-15.44	0.41	-95.74
	1520.00	5.50	359.72	109.47	1515.46	103.31	-15.68	0.37	-103.21
	1610.00	5.88	358.31	109.47	1605.02	112.23	-15.83	0.45	-112.13
	1699.00	5.61	356.24	112.17	1693.57	121.13	-16.25	0.38	-121.03
	1789.00	5.79	357.00	114.87	1783.13	130.05	-16.78	0.22	-129.95
	1877.00	5.72	348.37	117.58	1870.68	138.78	-17.90	0.99	-138.67
	1967.00	5.70	352.22	117.58	1960.24	147.60	-19.41	0.43	-147.48
	2057.00	5.88	355.78	117.58	2049.78	156.63	-20.35	0.45	-156.50
	2146.00	5.83	353.95	120.28	2138.31	165.67	-21.16	0.22	-165.54
	2236.00	5.83	354.74	120.28	2227.85	174.77	-22.06	0.09	-174.63
	2325.00	5.71	355.06	122.98	2316.40	183.68	-22.86	0.14	-183.53
	2414.00	5.66	359.32	122.98	2404.96	192.48	-23.29	0.48	-192.33
	2504.00	5.81	3.52	122.98	2494.51	201.46	-23.07	0.50	-201.32
	2594.00	5.70	2.03	125.69	2584.06	210.48	-22.63	0.21	-210.33
	2683.00	5.67	6.58	128.39	2672.62	219.26	-21.97	0.51	-219.12
	2773.00	5.71	14.46	128.39	2762.18	228.01	-20.34	0.87	-227.88
	2862.00	5.66	14.71	128.39	2850.74	236.54	-18.12	0.06	-236.43
	2951.00	5.82	7.36	133.80	2939.30	245.26	-16.43	0.84	-245.16
	3041.00	5.65	11.96	131.09	3028.85	254.12	-14.92	0.54	-254.03
	3130.00	5.68	4.56	131.09	3117.41	262.80	-13.67	0.82	-262.71
	3220.00	5.96	356.85	133.80	3206.95	271.91	-13.57	0.92	-271.82
	3309.00	5.77	345.52	133.80	3295.49	280.85	-14.94	1.32	-280.76
	3398.00	5.75	342.22	136.50	3384.04	289.43	-17.42	0.37	-289.32
	3488.00	5.68	346.70	136.50	3473.59	298.06	-19.82	0.50	-297.93
	3577.00	5.68	348.86	136.50	3562.15	306.66	-21.69	0.24	-306.53
	3667.00	5.54	350.18	139.20	3651.72	315.31	-23.29	0.21	-315.17
	3756.00	5.50	358.74	139.20	3740.31	323.81	-24.11	0.93	-323.66
	3846.00	5.95	354.05	139.20	3829.86	332.76	-24.69	0.72	-332.61
	3935.00	5.97	349.13	141.91	3918.38	341.90	-26.04	0.57	-341.73
	4024.00	5.80	346.37	141.91	4006.91	350.81	-27.98	0.37	-350.63
	4114.00	5.88	348.21	144.61	4096.45	359.74	-29.99	0.23	-359.55
	4203.00	5.73	358.12	144.61	4184.99	368.65	-31.07	1.14	-368.45
	4293.00	5.70	0.35	144.61	4274.54	377.61	-31.19	0.25	-377.41
	4382.00	5.93	359.04	147.31	4363.09	386.62	-31.24	0.30	-386.43
	4471.00	5.91	350.33	147.31	4451.61	395.74	-32.08	1.01	-395.53
	4561.00	5.93	341.38	147.31	4541.14	404.71	-34.35	1.02	-404.49
	4650.00	5.85	346.19	150.02	4629.67	413.47	-36.90	0.56	-413.24
	4739.00	5.56	358.24	152.72	4718.23	422.19	-38.11	1.38	-421.95
	4828.00	5.67	6.38	152.72	4806.80	430.87	-37.76	0.90	-430.63
	4918.00	6.14	2.66	152.72	4896.33	440.09	-37.04	0.67	-439.86
	5007.00	6.07	357.25	152.72	4984.82	449.55	-37.04	0.65	-449.31
	5097.00	6.15	352.42	155.42	5074.31	459.08	-37.91	0.58	-458.84
	5186.00	5.75	350.27	155.42	5162.83	468.20	-39.29	0.51	-467.95
	5275.00	5.91	351.36	158.12	5251.37	477.12	-40.73	0.22	-476.87
	5365.00	5.24	354.38	158.12	5340.94	485.79	-41.83	0.81	-485.53
	5454.00	5.51	354.44	160.83	5429.55	494.09	-42.64	0.30	-493.82
	5544.00	5.32	350.30	160.83	5519.15	502.51	-43.76	0.48	-502.23
	5633.00	5.48	345.83	160.83	5607.76	510.69	-45.50	0.51	-510.41
	5723.00	6.15	337.02	163.53	5697.30	519.30	-48.43	1.24	-518.99
	5812.00	5.08	331.58	166.23	5785.87	527.15	-52.17	1.34	-526.82
	5902.00	5.24	340.07	166.23	5875.50	534.52	-55.47	0.87	-534.17
	5991.00	5.23	342.26	166.23	5964.13	542.20	-58.09	0.22	-541.84
	6081.00	5.04	348.10	168.94	6053.77	549.98	-60.16	0.62	-549.60
	6170.00	5.40	353.55	168.94	6142.40	557.97	-61.43	0.69	-557.58
	6260.00	5.51	353.92	171.64	6232.00	566.47	-62.37	0.13	-566.08
	6349.00	5.01	3.01	206.78	6320.62	574.60	-62.61	1.09	-574.21
	6438.00	5.98	8.96	171.64	6409.21	583.06	-61.69	1.26	-582.67
	6528.00	6.11	18.95	174.34	6498.72	592.22	-59.40	1.18	-591.85
	6617.00	5.88	17.90	177.05	6587.23	601.04	-56.46	0.29	-600.69
	6707.00	5.85	21.32	174.34	6676.76	609.70	-53.38	0.39	-609.36
	6796.00	6.42	27.16	177.05	6765.25	618.35	-49.46	0.95	-618.04
	6885.00	6.42	15.79	179.75	6853.69	627.57	-45.83	1.43	-627.28
	6975.00	6.48	3.24	179.75	6943.13	637.48	-44.18	1.56	-637.20
	7064.00	6.25	2.88	182.45	7031.58	647.33	-43.65	0.26	-647.06
	7153.00	1.51	323.96	182.45	7120.36	653.12	-44.10	5.80	-652.84
	7243.00	6.53	181.92	182.45	7210.19	648.96	-44.97	8.64	-648.68
	7332.00	14.99	181.25	182.45	7297.55	632.37	-45.39	9.51	-632.08
	7422.00	24.38	179.41	187.86	7382.19	602.09	-45.45	10.45	-601.80
	7511.00	32.91	176.83	187.86	7460.23	559.50	-43.92	9.68	-559.22
	7600.00	41.87	177.19	190.56	7530.87	505.58	-41.12	10.07	-505.32
	7690.00	50.32	179.16	193.27	7593.23	440.83	-39.14	9.52	-440.58
	7779.00	60.18	180.83	195.97	7643.90	367.80	-39.20	11.19	-367.56
	7868.00	69.77	179.60	198.67	7681.51	287.25	-39.46	10.85	-287.01
	7957.00	79.98	178.39	201.37	7704.70	201.47	-37.94	11.55	-201.23

Proj

8047.00	90.31	178.58	201.37	7712.30	111.94	-35.57	11.48	-111.72
8136.00	90.28	176.94	204.08	7711.85	23.01	-32.09	1.84	-22.82
8226.00	89.69	176.86	198.67	7711.87	-66.85	-27.22	0.66	67.02
8315.00	89.26	177.17	204.08	7712.69	-155.73	-22.59	0.60	155.86
8405.00	88.46	178.14	204.08	7714.48	-245.63	-18.91	1.40	245.74
8494.00	88.58	179.97	204.08	7716.77	-334.59	-17.44	2.06	334.69
8583.00	88.18	179.57	204.08	7719.29	-423.55	-17.08	0.64	423.65
8673.00	87.41	179.38	206.78	7722.75	-513.48	-16.26	0.88	513.57
8762.00	87.56	179.05	209.48	7726.66	-602.39	-15.04	0.41	602.47
8852.00	89.94	181.15	212.19	7728.62	-692.35	-15.20	3.53	692.43
8941.00	90.22	181.12	214.89	7728.50	-781.34	-16.96	0.32	781.42
9030.00	90.12	180.07	214.89	7728.23	-870.33	-17.89	1.19	870.42
9120.00	90.25	179.36	214.89	7727.94	-960.33	-17.44	0.80	960.42
9209.00	89.57	178.59	217.59	7728.08	-1049.31	-15.85	1.15	1049.39
9299.00	89.78	177.96	220.30	7728.59	-1139.27	-13.14	0.74	1139.33
9388.00	89.69	183.12	220.30	7729.01	-1228.23	-13.98	5.80	1228.30
9477.00	89.94	178.25	220.30	7729.29	-1317.20	-15.04	5.48	1317.27
9567.00	88.83	176.84	220.30	7730.26	-1407.11	-11.19	1.99	1407.15
9656.00	89.02	177.33	220.30	7731.93	-1495.98	-6.66	0.59	1495.99
9746.00	88.83	175.10	223.00	7733.62	-1585.76	-0.72	2.49	1585.73
9835.00	89.72	176.69	220.30	7734.74	-1674.52	5.65	2.05	1674.45
9925.00	89.94	180.16	220.30	7735.01	-1764.47	8.12	3.86	1764.39
10014.00	89.85	180.76	220.30	7735.17	-1853.47	7.41	0.68	1853.39
10103.00	90.12	183.29	255.44	7735.20	-1942.41	4.26	2.86	1942.34
10192.00	90.43	185.39	223.00	7734.77	-2031.14	-2.47	2.39	2031.12
10282.00	90.95	185.82	223.00	7733.69	-2120.71	-11.26	0.75	2120.74
10371.00	90.92	184.30	263.55	7732.23	-2209.35	-19.11	1.71	2209.42
10461.00	89.85	183.54	228.41	7731.63	-2299.13	-25.26	1.46	2299.24
10550.00	90.18	183.52	228.41	7731.61	-2387.96	-30.74	0.37	2388.11
10639.00	89.97	182.38	231.11	7731.49	-2476.84	-35.32	1.30	2477.01
10729.00	91.20	181.69	231.11	7730.57	-2566.78	-38.52	1.57	2566.97
10818.00	91.17	180.26	233.81	7728.73	-2655.75	-40.03	1.61	2655.94
10907.00	91.08	179.02	233.81	7726.98	-2744.72	-39.47	1.40	2744.91
10997.00	91.72	179.34	236.52	7724.78	-2834.69	-38.18	0.79	2834.87
11086.00	89.26	178.66	236.52	7724.02	-2923.66	-36.63	2.87	2923.83
11175.00	89.38	178.57	236.52	7725.08	-3012.63	-34.48	0.17	3012.79
11265.00	89.32	178.18	236.52	7726.10	-3102.59	-31.93	0.44	3102.73
11354.00	91.20	179.65	236.52	7725.70	-3191.57	-30.24	2.68	3191.69
11443.00	90.12	179.44	239.22	7724.67	-3280.56	-29.54	1.24	3280.67
11533.00	91.23	180.34	239.22	7723.61	-3370.55	-29.36	1.59	3370.66
11622.00	89.94	178.89	241.92	7722.70	-3459.54	-28.77	2.18	3459.65
11711.00	90.00	177.89	241.92	7722.75	-3548.50	-26.27	1.13	3548.59
11801.00	90.12	176.97	241.92	7722.65	-3638.41	-22.23	1.03	3638.48
11890.00	89.75	175.82	241.92	7722.76	-3727.23	-16.63	1.36	3727.26
11979.00	89.57	175.80	241.92	7723.28	-3815.99	-10.13	0.20	3815.98
12069.00	89.66	177.87	244.62	7723.89	-3905.85	-5.16	2.30	3905.81
12158.00	89.78	179.14	244.62	7724.32	-3994.81	-2.84	1.43	3994.76
12248.00	89.85	178.70	244.62	7724.61	-4084.80	-1.14	0.50	4084.73
12337.00	88.31	181.53	239.22	7726.04	-4173.77	-1.32	3.62	4173.70
12427.00	89.85	182.61	247.33	7727.49	-4263.70	-4.57	2.09	4263.65
12516.00	89.82	182.87	244.62	7727.74	-4352.60	-8.83	0.29	4352.57
12539.00	90.43	183.68	241.92	7727.69	-4375.56	-10.14	4.41	4375.54
12563.00	90.43	183.68		7727.51	-4399.51	-11.68	0.00	4399.50