

VERDAD RESOURCES

WATTENBERG FIELD

1N-65W-22 FAWN 2734 & 2833 PAD

FAWN 2833-03H

Plan A

Plan: Design #1

Standard Planning Report

30 July, 2022

Project: WATTENBERG FIELD
Site: 1N-65W-22 FAWN 2734 & 2833 PAD
Well: FAWN 2833-03H
Wellbore: Plan A
Design: Design #1

VERDAD RESOURCES

CASING DETAILS

TVD	MD	Name	Size
2250.00	2410.76	9 5/8"	9-5/8

SHL
244' FSL
2270' FWL

LP/TPZ
460' FNL
1457' FEL

BPZ
460' FSL
1457' FEL

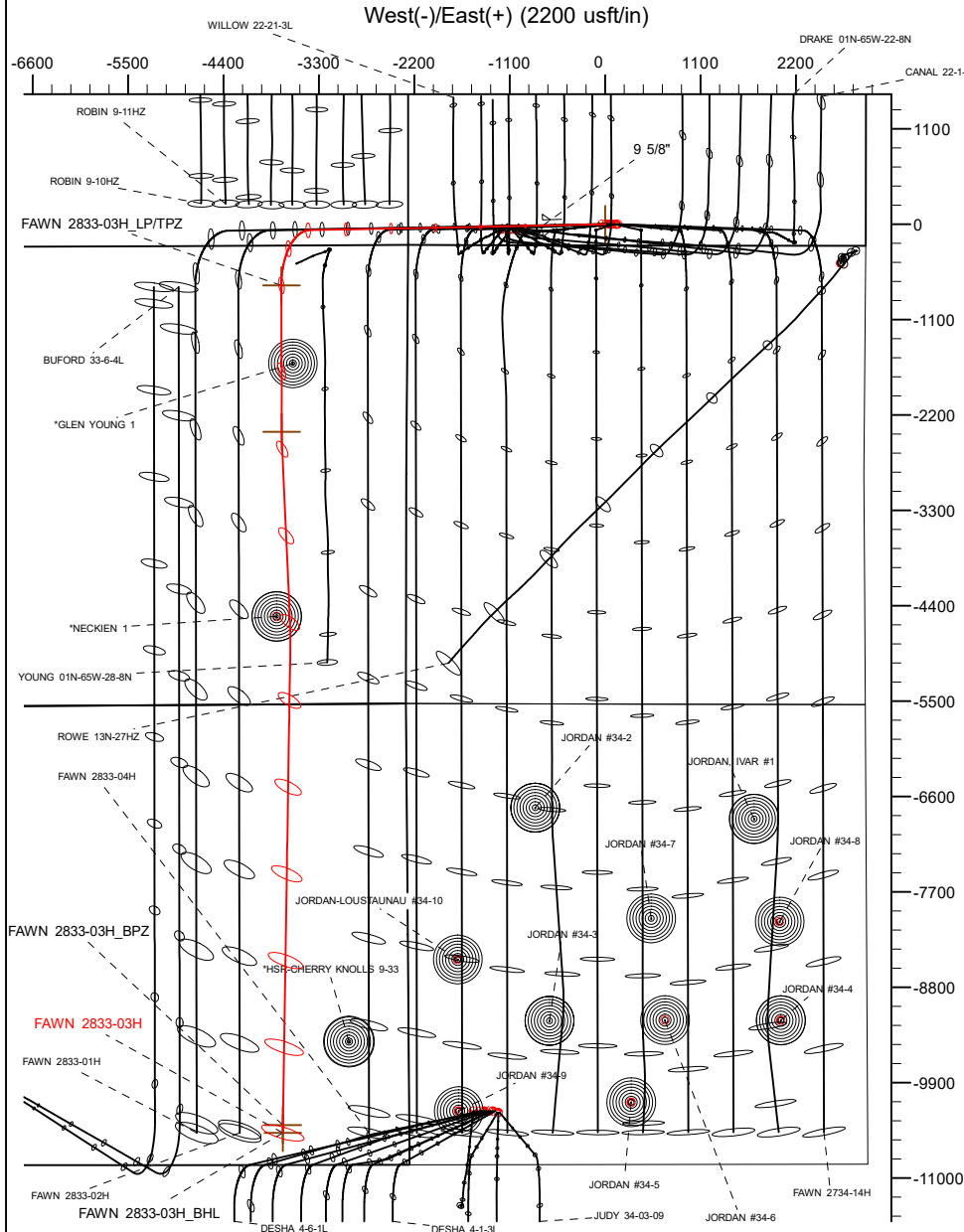
BHL
370' FSL
1458' FEL

SECTION DETAILS

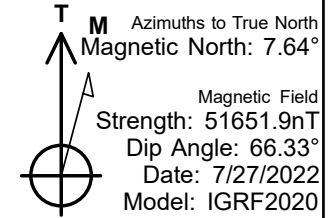
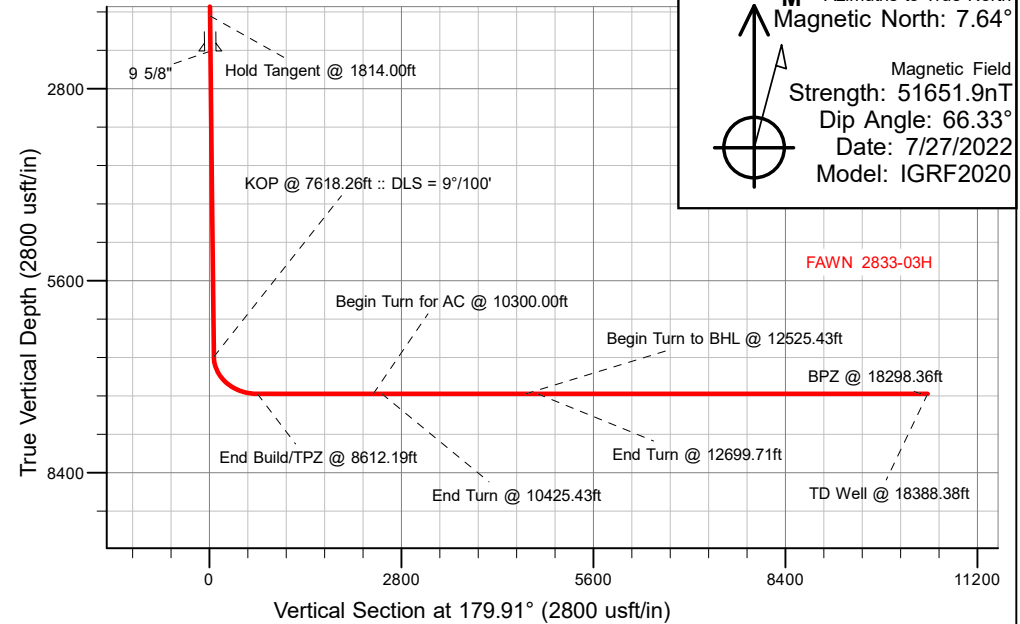
MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	VSect	Target
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
260.00	0.00	0.00	260.00	0.00	0.00	0.00	0.00	0.00	
1814.00	31.08	268.85	1738.90	-8.25	-411.17	2.00	268.85	7.61	
7618.26	31.08	268.85	6709.95	-68.39	-3406.92	0.00	0.00	63.04	
8612.19	90.00	179.91	7250.00	-705.50	-3731.37	9.00	-89.09	699.64	
10300.00	90.00	179.91	7250.00	-2393.31	-3728.68	0.00	0.00	2387.45	FAWN 2833-03H_Tgt
10425.43	90.00	177.40	7250.00	-2518.69	-3725.73	2.00	-90.00	2512.84	
12525.43	90.00	177.40	7250.00	-4616.53	-3630.47	0.00	0.00	4610.82	
12699.71	90.00	180.89	7250.00	-4790.77	-3627.87	2.00	90.00	4785.06	
18388.38	90.00	180.89	7250.00	-10478.75	-3715.79	0.00	0.00	10472.90	FAWN 2833-03H_BHL

WELLBORE TARGET DETAILS (LAT/LONG)

Name	TVD	Northing	Easting	Latitude	Longitude
FAWN 2833-03H_SHL	0.00	1255030.36	3237605.91	40.030325	-104.651482
FAWN 2833-03H_LP/TPZ	7250.00	1254289.22	3233881.52	40.028388	-104.664807
FAWN 2833-03H_BPZ	7250.00	1244606.53	3233989.55	40.001805	-104.664747
FAWN 2833-03H_BHL	7250.00	1244516.53	3233990.56	40.001558	-104.664746



South(-)/North(+) (2200 usft/in)



WELL DETAILS: FAWN 2833-03H

GL = 5107'

RKB = 20' @ 5127.00usft (RIG)

Plan: Design #1 (FAWN 2833-03H/Plan A)

Date: 7/30/2022

Planning Report

Database:	EDM 5000.16 Single User Db	Local Co-ordinate Reference:	Well FAWN 2833-03H
Company:	VERDAD RESOURCES	TVD Reference:	RKB = 20' @ 5127.00usft (RIG)
Project:	WATTENBERG FIELD	MD Reference:	RKB = 20' @ 5127.00usft (RIG)
Site:	1N-65W-22 FAWN 2734 & 2833 PAD	North Reference:	True
Well:	FAWN 2833-03H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Design #1		

Project	WATTENBERG FIELD		
Map System:	US State Plane 1983	System Datum:	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	Colorado Northern Zone		

Site		1N-65W-22 FAWN 2734 & 2833 PAD				
Site Position:		Northing:	1,255,173.64	usft	Latitude:	40.030719
From:	Lat/Long	Easting:	3,237,589.54	usft	Longitude:	-104.651536
Position Uncertainty:		0.00	usft	Slot Radius:	13-3/16	"

Well		FAWN 2833-03H				
Well Position	+N/-S	0.00 usft	Northing:	1,255,030.36 usft	Latitude:	40.030325
	+E/-W	0.00 usft	Easting:	3,237,605.91 usft	Longitude:	-104.651483
Position Uncertainty		3.28 usft	Wellhead Elevation:	usft	Ground Level:	5,107.00 usft
Grid Convergence:		0.55 °				

Wellbore	Plan A				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF202013	7/27/2022	7.64	66.33	51,651.91600226

Design	Design #1				
Audit Notes:					
Version:		Phase:	PLAN	Tie On Depth:	0.00
Vertical Section:	Depth From (TVD) (usft)	+N/-S (usft)	+E/-W (usft)	Direction (°)	
	0.00	0.00	0.00	179.91	

Plan Survey Tool Program	Date	7/30/2022			
Depth From (usft)	Depth To (usft)	Survey (Wellbore)	Tool Name	Remarks	
1	0.00	2,250.00	Design #1 (Plan A)	ISCWSA MWD	
				Fixed:v2:standard declination	
2	2,250.00	18,388.38	Design #1 (Plan A)	ISCWSA MWD	
				Fixed:v2:standard declination	

Planning Report

Database:	EDM 5000.16 Single User Db	Local Co-ordinate Reference:	Well FAWN 2833-03H
Company:	VERDAD RESOURCES	TVD Reference:	RKB = 20' @ 5127.00usft (RIG)
Project:	WATTENBERG FIELD	MD Reference:	RKB = 20' @ 5127.00usft (RIG)
Site:	1N-65W-22 FAWN 2734 & 2833 PAD	North Reference:	True
Well:	FAWN 2833-03H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Design #1		

Plan Sections										
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	TFO (°)	Target
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
260.00	0.00	0.00	260.00	0.00	0.00	0.00	0.00	0.00	0.00	
1,814.00	31.08	268.85	1,738.90	-8.25	-411.17	2.00	2.00	0.00	268.85	
7,618.26	31.08	268.85	6,709.95	-68.39	-3,406.92	0.00	0.00	0.00	0.00	
8,612.19	90.00	179.91	7,250.00	-705.50	-3,731.37	9.00	5.93	-8.95	-89.09	
10,300.00	90.00	179.91	7,250.00	-2,393.31	-3,728.68	0.00	0.00	0.00	0.00	FAWN 2833-03H_Tgt
10,425.43	90.00	177.40	7,250.00	-2,518.69	-3,725.73	2.00	0.00	-2.00	-90.00	
12,525.43	90.00	177.40	7,250.00	-4,616.53	-3,630.47	0.00	0.00	0.00	0.00	
12,699.71	90.00	180.89	7,250.00	-4,790.77	-3,627.87	2.00	0.00	2.00	90.00	
18,388.38	90.00	180.89	7,250.00	-10,478.75	-3,715.79	0.00	0.00	0.00	0.00	FAWN 2833-03H_BHI

Planning Report

Database:	EDM 5000.16 Single User Db	Local Co-ordinate Reference:	Well FAWN 2833-03H
Company:	VERDAD RESOURCES	TVD Reference:	RKB = 20' @ 5127.00usft (RIG)
Project:	WATTENBERG FIELD	MD Reference:	RKB = 20' @ 5127.00usft (RIG)
Site:	1N-65W-22 FAWN 2734 & 2833 PAD	North Reference:	True
Well:	FAWN 2833-03H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Design #1		

Planned 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)
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
100.00	0.00	0.00	100.00	0.00	0.00	0.00	0.00	0.00	0.00
200.00	0.00	0.00	200.00	0.00	0.00	0.00	0.00	0.00	0.00
260.00	0.00	0.00	260.00	0.00	0.00	0.00	0.00	0.00	0.00
Begin Nudge @260.00ft									
300.00	0.80	268.85	300.00	-0.01	-0.28	0.01	2.00	2.00	0.00
400.00	2.80	268.85	399.94	-0.07	-3.42	0.06	2.00	2.00	0.00
500.00	4.80	268.85	499.72	-0.20	-10.05	0.19	2.00	2.00	0.00
600.00	6.80	268.85	599.20	-0.40	-20.15	0.37	2.00	2.00	0.00
700.00	8.80	268.85	698.27	-0.68	-33.72	0.62	2.00	2.00	0.00
800.00	10.80	268.85	796.81	-1.02	-50.73	0.94	2.00	2.00	0.00
900.00	12.80	268.85	894.69	-1.43	-71.18	1.32	2.00	2.00	0.00
1,000.00	14.80	268.85	991.80	-1.91	-95.02	1.76	2.00	2.00	0.00
1,100.00	16.80	268.85	1,088.02	-2.45	-122.25	2.26	2.00	2.00	0.00
1,200.00	18.80	268.85	1,183.22	-3.07	-152.81	2.83	2.00	2.00	0.00
1,300.00	20.80	268.85	1,277.31	-3.75	-186.67	3.45	2.00	2.00	0.00
1,400.00	22.80	268.85	1,370.15	-4.49	-223.80	4.14	2.00	2.00	0.00
1,500.00	24.80	268.85	1,461.64	-5.30	-264.14	4.89	2.00	2.00	0.00
1,600.00	26.80	268.85	1,551.67	-6.18	-307.66	5.69	2.00	2.00	0.00
1,700.00	28.80	268.85	1,640.12	-7.11	-354.28	6.56	2.00	2.00	0.00
1,800.00	30.80	268.85	1,726.89	-8.11	-403.97	7.47	2.00	2.00	0.00
1,814.00	31.08	268.85	1,738.90	-8.25	-411.17	7.61	2.00	2.00	0.00
Hold Tangent @ 1814.00ft									
1,900.00	31.08	268.85	1,812.56	-9.14	-455.55	8.43	0.00	0.00	0.00
2,000.00	31.08	268.85	1,898.20	-10.18	-507.17	9.38	0.00	0.00	0.00
2,100.00	31.08	268.85	1,983.85	-11.22	-558.78	10.34	0.00	0.00	0.00
2,200.00	31.08	268.85	2,069.49	-12.25	-610.39	11.29	0.00	0.00	0.00
2,300.00	31.08	268.85	2,155.14	-13.29	-662.00	12.25	0.00	0.00	0.00
2,400.00	31.08	268.85	2,240.78	-14.33	-713.62	13.20	0.00	0.00	0.00
2,410.76	31.08	268.85	2,250.00	-14.44	-719.17	13.31	0.00	0.00	0.00
9 5/8"									
2,500.00	31.08	268.85	2,326.43	-15.36	-765.23	14.16	0.00	0.00	0.00
2,600.00	31.08	268.85	2,412.07	-16.40	-816.84	15.11	0.00	0.00	0.00
2,700.00	31.08	268.85	2,497.72	-17.43	-868.46	16.07	0.00	0.00	0.00
2,800.00	31.08	268.85	2,583.36	-18.47	-920.07	17.02	0.00	0.00	0.00
2,900.00	31.08	268.85	2,669.00	-19.51	-971.68	17.98	0.00	0.00	0.00
3,000.00	31.08	268.85	2,754.65	-20.54	-1,023.30	18.93	0.00	0.00	0.00
3,100.00	31.08	268.85	2,840.29	-21.58	-1,074.91	19.89	0.00	0.00	0.00
3,200.00	31.08	268.85	2,925.94	-22.61	-1,126.52	20.84	0.00	0.00	0.00
3,300.00	31.08	268.85	3,011.58	-23.65	-1,178.14	21.80	0.00	0.00	0.00
3,400.00	31.08	268.85	3,097.23	-24.69	-1,229.75	22.75	0.00	0.00	0.00
3,500.00	31.08	268.85	3,182.87	-25.72	-1,281.36	23.71	0.00	0.00	0.00
3,600.00	31.08	268.85	3,268.52	-26.76	-1,332.97	24.66	0.00	0.00	0.00
3,700.00	31.08	268.85	3,354.16	-27.79	-1,384.59	25.62	0.00	0.00	0.00
3,800.00	31.08	268.85	3,439.81	-28.83	-1,436.20	26.57	0.00	0.00	0.00
3,900.00	31.08	268.85	3,525.45	-29.87	-1,487.81	27.53	0.00	0.00	0.00
4,000.00	31.08	268.85	3,611.10	-30.90	-1,539.43	28.48	0.00	0.00	0.00
4,100.00	31.08	268.85	3,696.74	-31.94	-1,591.04	29.44	0.00	0.00	0.00
4,200.00	31.08	268.85	3,782.39	-32.97	-1,642.65	30.39	0.00	0.00	0.00
4,300.00	31.08	268.85	3,868.03	-34.01	-1,694.27	31.35	0.00	0.00	0.00
4,400.00	31.08	268.85	3,953.68	-35.05	-1,745.88	32.30	0.00	0.00	0.00
4,500.00	31.08	268.85	4,039.32	-36.08	-1,797.49	33.26	0.00	0.00	0.00
4,600.00	31.08	268.85	4,124.97	-37.12	-1,849.10	34.21	0.00	0.00	0.00

Planning Report

Database:	EDM 5000.16 Single User Db	Local Co-ordinate Reference:	Well FAWN 2833-03H
Company:	VERDAD RESOURCES	TVD Reference:	RKB = 20' @ 5127.00usft (RIG)
Project:	WATTENBERG FIELD	MD Reference:	RKB = 20' @ 5127.00usft (RIG)
Site:	1N-65W-22 FAWN 2734 & 2833 PAD	North Reference:	True
Well:	FAWN 2833-03H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Design #1		

Planned 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)
4,700.00	31.08	268.85	4,210.61	-38.15	-1,900.72	35.17	0.00	0.00	0.00
4,800.00	31.08	268.85	4,296.25	-39.19	-1,952.33	36.12	0.00	0.00	0.00
4,900.00	31.08	268.85	4,381.90	-40.23	-2,003.94	37.08	0.00	0.00	0.00
5,000.00	31.08	268.85	4,467.54	-41.26	-2,055.56	38.03	0.00	0.00	0.00
5,100.00	31.08	268.85	4,553.19	-42.30	-2,107.17	38.99	0.00	0.00	0.00
5,200.00	31.08	268.85	4,638.83	-43.34	-2,158.78	39.94	0.00	0.00	0.00
5,300.00	31.08	268.85	4,724.48	-44.37	-2,210.40	40.90	0.00	0.00	0.00
5,400.00	31.08	268.85	4,810.12	-45.41	-2,262.01	41.85	0.00	0.00	0.00
5,500.00	31.08	268.85	4,895.77	-46.44	-2,313.62	42.81	0.00	0.00	0.00
5,600.00	31.08	268.85	4,981.41	-47.48	-2,365.24	43.76	0.00	0.00	0.00
5,700.00	31.08	268.85	5,067.06	-48.52	-2,416.85	44.72	0.00	0.00	0.00
5,800.00	31.08	268.85	5,152.70	-49.55	-2,468.46	45.67	0.00	0.00	0.00
5,900.00	31.08	268.85	5,238.35	-50.59	-2,520.07	46.63	0.00	0.00	0.00
6,000.00	31.08	268.85	5,323.99	-51.62	-2,571.69	47.58	0.00	0.00	0.00
6,100.00	31.08	268.85	5,409.64	-52.66	-2,623.30	48.54	0.00	0.00	0.00
6,200.00	31.08	268.85	5,495.28	-53.70	-2,674.91	49.49	0.00	0.00	0.00
6,300.00	31.08	268.85	5,580.93	-54.73	-2,726.53	50.45	0.00	0.00	0.00
6,400.00	31.08	268.85	5,666.57	-55.77	-2,778.14	51.40	0.00	0.00	0.00
6,500.00	31.08	268.85	5,752.21	-56.80	-2,829.75	52.36	0.00	0.00	0.00
6,600.00	31.08	268.85	5,837.86	-57.84	-2,881.37	53.31	0.00	0.00	0.00
6,700.00	31.08	268.85	5,923.50	-58.88	-2,932.98	54.27	0.00	0.00	0.00
6,800.00	31.08	268.85	6,009.15	-59.91	-2,984.59	55.22	0.00	0.00	0.00
6,900.00	31.08	268.85	6,094.79	-60.95	-3,036.20	56.18	0.00	0.00	0.00
7,000.00	31.08	268.85	6,180.44	-61.98	-3,087.82	57.13	0.00	0.00	0.00
7,100.00	31.08	268.85	6,266.08	-63.02	-3,139.43	58.09	0.00	0.00	0.00
7,200.00	31.08	268.85	6,351.73	-64.06	-3,191.04	59.04	0.00	0.00	0.00
7,300.00	31.08	268.85	6,437.37	-65.09	-3,242.66	60.00	0.00	0.00	0.00
7,400.00	31.08	268.85	6,523.02	-66.13	-3,294.27	60.95	0.00	0.00	0.00
7,500.00	31.08	268.85	6,608.66	-67.17	-3,345.88	61.91	0.00	0.00	0.00
7,600.00	31.08	268.85	6,694.31	-68.20	-3,397.50	62.86	0.00	0.00	0.00
7,618.26	31.08	268.85	6,709.95	-68.39	-3,406.92	63.04	0.00	0.00	0.00
KOP @ 7618.26ft :: DLS = 9°/100'									
7,650.00	31.24	263.34	6,737.11	-69.51	-3,423.29	64.13	9.00	0.51	-17.37
7,700.00	31.97	254.86	6,779.72	-74.48	-3,448.96	69.06	9.00	1.45	-16.96
7,750.00	33.23	246.83	6,821.86	-83.33	-3,474.34	77.87	9.00	2.52	-16.05
7,800.00	34.97	239.42	6,863.28	-96.01	-3,499.29	90.52	9.00	3.48	-14.82

Planning Report

Database:	EDM 5000.16 Single User Db	Local Co-ordinate Reference:	Well FAWN 2833-03H
Company:	VERDAD RESOURCES	TVD Reference:	RKB = 20' @ 5127.00usft (RIG)
Project:	WATTENBERG FIELD	MD Reference:	RKB = 20' @ 5127.00usft (RIG)
Site:	1N-65W-22 FAWN 2734 & 2833 PAD	North Reference:	True
Well:	FAWN 2833-03H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Design #1		

Planned 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)
8,700.00	90.00	179.91	7,250.00	-793.31	-3,731.23	787.45	0.00	0.00	0.00
8,800.00	90.00	179.91	7,250.00	-893.31	-3,731.07	887.45	0.00	0.00	0.00
8,900.00	90.00	179.91	7,250.00	-993.31	-3,730.91	987.45	0.00	0.00	0.00
9,000.00	90.00	179.91	7,250.00	-1,093.31	-3,730.76	1,087.45	0.00	0.00	0.00
9,100.00	90.00	179.91	7,250.00	-1,193.31	-3,730.60	1,187.45	0.00	0.00	0.00
9,200.00	90.00	179.91	7,250.00	-1,293.31	-3,730.44	1,287.45	0.00	0.00	0.00
9,300.00	90.00	179.91	7,250.00	-1,393.31	-3,730.28	1,387.45	0.00	0.00	0.00
9,400.00	90.00	179.91	7,250.00	-1,493.31	-3,730.12	1,487.45	0.00	0.00	0.00
9,500.00	90.00	179.91	7,250.00	-1,593.31	-3,729.96	1,587.45	0.00	0.00	0.00
9,600.00	90.00	179.91	7,250.00	-1,693.31	-3,729.80	1,687.45	0.00	0.00	0.00
9,700.00	90.00	179.91	7,250.00	-1,793.31	-3,729.64	1,787.45	0.00	0.00	0.00
9,800.00	90.00	179.91	7,250.00	-1,893.31	-3,729.48	1,887.45	0.00	0.00	0.00
9,900.00	90.00	179.91	7,250.00	-1,993.31	-3,729.32	1,987.45	0.00	0.00	0.00
10,000.00	90.00	179.91	7,250.00	-2,093.31	-3,729.16	2,087.45	0.00	0.00	0.00
10,100.00	90.00	179.91	7,250.00	-2,193.31	-3,729.00	2,187.45	0.00	0.00	0.00
10,200.00	90.00	179.91	7,250.00	-2,293.31	-3,728.84	2,287.45	0.00	0.00	0.00
10,300.00	90.00	179.91	7,250.00	-2,393.31	-3,728.68	2,387.45	0.00	0.00	0.00
Begin Turn for AC @ 10300.00ft									
10,400.00	90.00	177.91	7,250.00	-2,493.29	-3,726.78	2,487.43	2.00	0.00	-2.00
10,425.43	90.00	177.40	7,250.00	-2,518.69	-3,725.73	2,512.84	2.00	0.00	-2.00
End Turn @ 10425.43ft									
10,500.00	90.00	177.40	7,250.00	-2,593.19	-3,722.35	2,587.34	0.00	0.00	0.00
10,600.00	90.00	177.40	7,250.00	-2,693.09	-3,717.82	2,687.24	0.00	0.00	0.00
10,700.00	90.00	177.40	7,250.00	-2,792.98	-3,713.28	2,787.15	0.00	0.00	0.00
10,800.00	90.00	177.40	7,250.00	-2,892.88	-3,708.74	2,887.05	0.00	0.00	0.00
10,900.00	90.00	177.40	7,250.00	-2,992.78	-3,704.21	2,986.95	0.00	0.00	0.00
11,000.00	90.00	177.40	7,250.00	-3,092.67	-3,699.67	3,086.86	0.00	0.00	0.00
11,100.00	90.00	177.40	7,250.00	-3,192.57	-3,695.13	3,186.76	0.00	0.00	0.00
11,200.00	90.00	177.40	7,250.00	-3,292.47	-3,690.60	3,286.67	0.00	0.00	0.00
11,300.00	90.00	177.40	7,250.00	-3,392.36	-3,686.06	3,386.57	0.00	0.00	0.00
11,400.00	90.00	177.40	7,250.00	-3,492.26	-3,681.53	3,486.47	0.00	0.00	0.00
11,500.00	90.00	177.40	7,250.00	-3,592.16	-3,676.99	3,586.38	0.00	0.00	0.00
11,600.00	90.00	177.40	7,250.00	-3,692.06	-3,672.45	3,686.28	0.00	0.00	0.00
11,700.00	90.00	177.40	7,250.00	-3,791.95	-3,667.92	3,786.19	0.00	0.00	0.00
11,800.00	90.00	177.40	7,250.00	-3,891.85	-3,663.38	3,886.09	0.00	0.00	0.00
11,900.00	90.00	177.40	7,250.00	-3,991.75	-3,658.84	3,985.99	0.00	0.00	0.00
12,000.00	90.00	177.40	7,250.00	-4,091.64	-3,654.31	4,085.90	0.00	0.00	0.00
12,100.00	90.00	177.40	7,250.00	-4,191.54	-3,649.77	4,185.80	0.00	0.00	0.00
12,200.00	90.00	177.40	7,250.00	-4,291.44	-3,645.23	4,285.71	0.00	0.00	0.00
12,300.00	90.00	177.40	7,250.00	-4,391.34	-3,640.70	4,385.61	0.00	0.00	0.00
12,400.00	90.00	177.40	7,250.00	-4,491.23	-3,636.16	4,485.51	0.00	0.00	0.00
12,500.00	90.00	177.40	7,250.00	-4,591.13	-3,631.63	4,585.42	0.00	0.00	0.00
12,525.43	90.00	177.40	7,250.00	-4,616.53	-3,630.47	4,610.82	0.00	0.00	0.00
Begin Turn to BHL @ 12525.43ft									
12,600.00	90.00	178.89	7,250.00	-4,691.06	-3,628.06	4,685.36	2.00	0.00	2.00
12,699.71	90.00	180.89	7,250.00	-4,790.77	-3,627.87	4,785.06	2.00	0.00	2.00
End Turn @ 12699.71ft									
12,800.00	90.00	180.89	7,250.00	-4,891.04	-3,629.42	4,885.34	0.00	0.00	0.00
12,900.00	90.00	180.89	7,250.00	-4,991.03	-3,630.96	4,985.32	0.00	0.00	0.00
13,000.00	90.00	180.89	7,250.00	-5,091.02	-3,632.51	5,085.31	0.00	0.00	0.00
13,100.00	90.00	180.89	7,250.00	-5,191.01	-3,634.05	5,185.29	0.00	0.00	0.00
13,200.00	90.00	180.89	7,250.00	-5,291.00	-3,635.60	5,285.28	0.00	0.00	0.00
13,300.00	90.00	180.89	7,250.00	-5,390.98	-3,637.14	5,385.27	0.00	0.00	0.00

Planning Report

Database:	EDM 5000.16 Single User Db	Local Co-ordinate Reference:	Well FAWN 2833-03H
Company:	VERDAD RESOURCES	TVD Reference:	RKB = 20' @ 5127.00usft (RIG)
Project:	WATTENBERG FIELD	MD Reference:	RKB = 20' @ 5127.00usft (RIG)
Site:	1N-65W-22 FAWN 2734 & 2833 PAD	North Reference:	True
Well:	FAWN 2833-03H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Design #1		

Planned 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)
13,400.00	90.00	180.89	7,250.00	-5,490.97	-3,638.69	5,485.25	0.00	0.00	0.00
13,500.00	90.00	180.89	7,250.00	-5,590.96	-3,640.23	5,585.24	0.00	0.00	0.00
13,600.00	90.00	180.89	7,250.00	-5,690.95	-3,641.78	5,685.22	0.00	0.00	0.00
13,700.00	90.00	180.89	7,250.00	-5,790.94	-3,643.33	5,785.21	0.00	0.00	0.00
13,800.00	90.00	180.89	7,250.00	-5,890.93	-3,644.87	5,885.19	0.00	0.00	0.00
13,900.00	90.00	180.89	7,250.00	-5,990.91	-3,646.42	5,985.18	0.00	0.00	0.00
14,000.00	90.00	180.89	7,250.00	-6,090.90	-3,647.96	6,085.16	0.00	0.00	0.00
14,100.00	90.00	180.89	7,250.00	-6,190.89	-3,649.51	6,185.15	0.00	0.00	0.00
14,200.00	90.00	180.89	7,250.00	-6,290.88	-3,651.05	6,285.13	0.00	0.00	0.00
14,300.00	90.00	180.89	7,250.00	-6,390.87	-3,652.60	6,385.12	0.00	0.00	0.00
14,400.00	90.00	180.89	7,250.00	-6,490.85	-3,654.14	6,485.11	0.00	0.00	0.00
14,500.00	90.00	180.89	7,250.00	-6,590.84	-3,655.69	6,585.09	0.00	0.00	0.00
14,600.00	90.00	180.89	7,250.00	-6,690.83	-3,657.24	6,685.08	0.00	0.00	0.00
14,700.00	90.00	180.89	7,250.00	-6,790.82	-3,658.78	6,785.06	0.00	0.00	0.00
14,800.00	90.00	180.89	7,250.00	-6,890.81	-3,660.33	6,885.05	0.00	0.00	0.00
14,900.00	90.00	180.89	7,250.00	-6,990.79	-3,661.87	6,985.03	0.00	0.00	0.00
15,000.00	90.00	180.89	7,250.00	-7,090.78	-3,663.42	7,085.02	0.00	0.00	0.00
15,100.00	90.00	180.89	7,250.00	-7,190.77	-3,664.96	7,185.00	0.00	0.00	0.00
15,200.00	90.00	180.89	7,250.00	-7,290.76	-3,666.51	7,284.99	0.00	0.00	0.00
15,300.00	90.00	180.89	7,250.00	-7,390.75	-3,668.06	7,384.98	0.00	0.00	0.00
15,400.00	90.00	180.89	7,250.00	-7,490.73	-3,669.60	7,484.96	0.00	0.00	0.00
15,500.00	90.00	180.89	7,250.00	-7,590.72	-3,671.15	7,584.95	0.00	0.00	0.00
15,600.00	90.00	180.89	7,250.00	-7,690.71	-3,672.69	7,684.93	0.00	0.00	0.00
15,700.00	90.00	180.89	7,250.00	-7,790.70	-3,674.24	7,784.92	0.00	0.00	0.00
15,800.00	90.00	180.89	7,250.00	-7,890.69	-3,675.78	7,884.90	0.00	0.00	0.00
15,900.00	90.00	180.89	7,250.00	-7,990.67	-3,677.33	7,984.89	0.00	0.00	0.00
16,000.00	90.00	180.89	7,250.00	-8,090.66	-3,678.87	8,084.87	0.00	0.00	0.00
16,100.00	90.00	180.89	7,250.00	-8,190.65	-3,680.42	8,184.86	0.00	0.00	0.00
16,200.00	90.00	180.89	7,250.00	-8,290.64	-3,681.97	8,284.84	0.00	0.00	0.00
16,300.00	90.00	180.89	7,250.00	-8,390.63	-3,683.51	8,384.83	0.00	0.00	0.00
16,400.00	90.00	180.89	7,250.00	-8,490.61	-3,685.06	8,484.82	0.00	0.00	0.00
16,500.00	90.00	180.89	7,250.00	-8,590.60	-3,686.60	8,584.80	0.00	0.00	0.00
16,600.00	90.00	180.89	7,250.00	-8,690.59	-3,688.15	8,684.79	0.00	0.00	0.00
16,700.00	90.00	180.89	7,250.00	-8,790.58	-3,689.69	8,784.77	0.00	0.00	0.00
16,800.00	90.00	180.89	7,250.00	-8,890.57	-3,691.24	8,884.76	0.00	0.00	0.00
16,900.00	90.00	180.89	7,250.00	-8,990.56	-3,692.78	8,984.74	0.00	0.00	0.00
17,000.00	90.00	180.89	7,250.00	-9,090.54	-3,694.33	9,084.73	0.00	0.00	0.00
17,100.00	90.00	180.89	7,250.00	-9,190.53	-3,695.88	9,184.71	0.00	0.00	0.00
17,200.00	90.00	180.89	7,250.00	-9,290.52	-3,697.42	9,284.70	0.00	0.00	0.00
17,300.00	90.00	180.89	7,250.00	-9,390.51	-3,698.97	9,384.69	0.00	0.00	0.00
17,400.00	90.00	180.89	7,250.00	-9,490.50	-3,700.51	9,484.67	0.00	0.00	0.00
17,500.00	90.00	180.89	7,250.00	-9,590.48	-3,702.06	9,584.66	0.00	0.00	0.00
17,600.00	90.00	180.89	7,250.00	-9,690.47	-3,703.60	9,684.64	0.00	0.00	0.00
17,700.00	90.00	180.89	7,250.00	-9,790.46	-3,705.15	9,784.63	0.00	0.00	0.00
17,800.00	90.00	180.89	7,250.00	-9,890.45	-3,706.69	9,884.61	0.00	0.00	0.00
17,900.00	90.00	180.89	7,250.00	-9,990.44	-3,708.24	9,984.60	0.00	0.00	0.00
18,000.00	90.00	180.89	7,250.00	-10,090.42	-3,709.79	10,084.58	0.00	0.00	0.00
18,100.00	90.00	180.89	7,250.00	-10,190.41	-3,711.33	10,184.57	0.00	0.00	0.00
18,200.00	90.00	180.89	7,250.00	-10,290.40	-3,712.88	10,284.55	0.00	0.00	0.00
18,298.36	90.00	180.89	7,250.00	-10,388.75	-3,714.40	10,382.90	0.00	0.00	0.00
BPZ @ 18298.36ft									
18,300.00	90.00	180.89	7,250.00	-10,390.39	-3,714.42	10,384.54	0.00	0.00	0.00
18,388.38	90.00	180.89	7,250.00	-10,478.75	-3,715.79	10,472.90	0.00	0.00	0.00
TD Well @ 18388.38ft									

Planning Report

Database:	EDM 5000.16 Single User Db	Local Co-ordinate Reference:	Well FAWN 2833-03H
Company:	VERDAD RESOURCES	TVD Reference:	RKB = 20' @ 5127.00usft (RIG)
Project:	WATTENBERG FIELD	MD Reference:	RKB = 20' @ 5127.00usft (RIG)
Site:	1N-65W-22 FAWN 2734 & 2833 PAD	North Reference:	True
Well:	FAWN 2833-03H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Design #1		

Planned 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)

Casing Points								
Measured Depth (usft)	Vertical Depth (usft)	Name			Casing Diameter (")	Hole Diameter (")		
2,410.76	2,250.00	9 5/8"			9-5/8	13-1/2		

Plan Annotations					
Measured Depth (usft)	Vertical Depth (usft)	Local Coordinates			Comment
		+N/-S (usft)	+E/-W (usft)		
260.00	260.00	0.00	0.00		Begin Nudge @260.00ft
1,814.00	1,738.90	-8.25	-411.17		Hold Tangent @ 1814.00ft
7,618.26	6,709.95	-68.39	-3,406.92		KOP @ 7618.26ft :: DLS = 9°/100'
8,612.19	7,250.00	-705.50	-3,731.37		End Build/TPZ @ 8612.19ft
10,300.00	7,250.00	-2,393.31	-3,728.68		Begin Turn for AC @ 10300.00ft
10,425.43	7,250.00	-2,518.69	-3,725.73		End Turn @ 10425.43ft
12,525.43	7,250.00	-4,616.53	-3,630.47		Begin Turn to BHL @ 12525.43ft
12,699.71	7,250.00	-4,790.77	-3,627.87		End Turn @ 12699.71ft
18,298.36	7,250.00	-10,388.75	-3,714.40		BPZ @ 18298.36ft
18,388.38	7,250.00	-10,478.75	-3,715.79		TD Well @ 18388.38ft