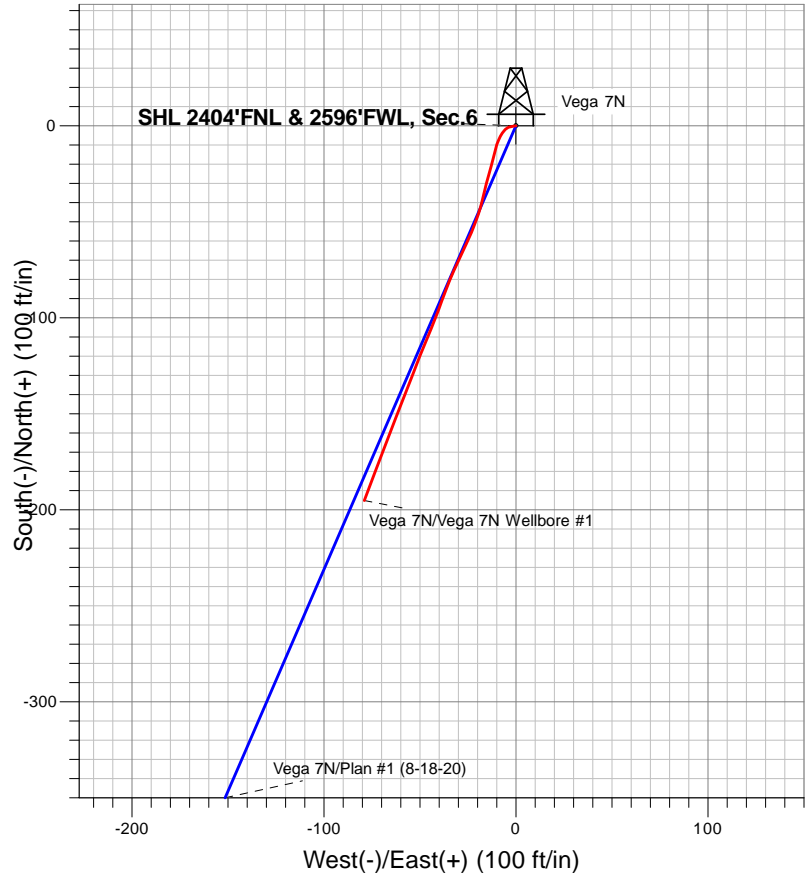


PDC Energy Inc. DJ Basin

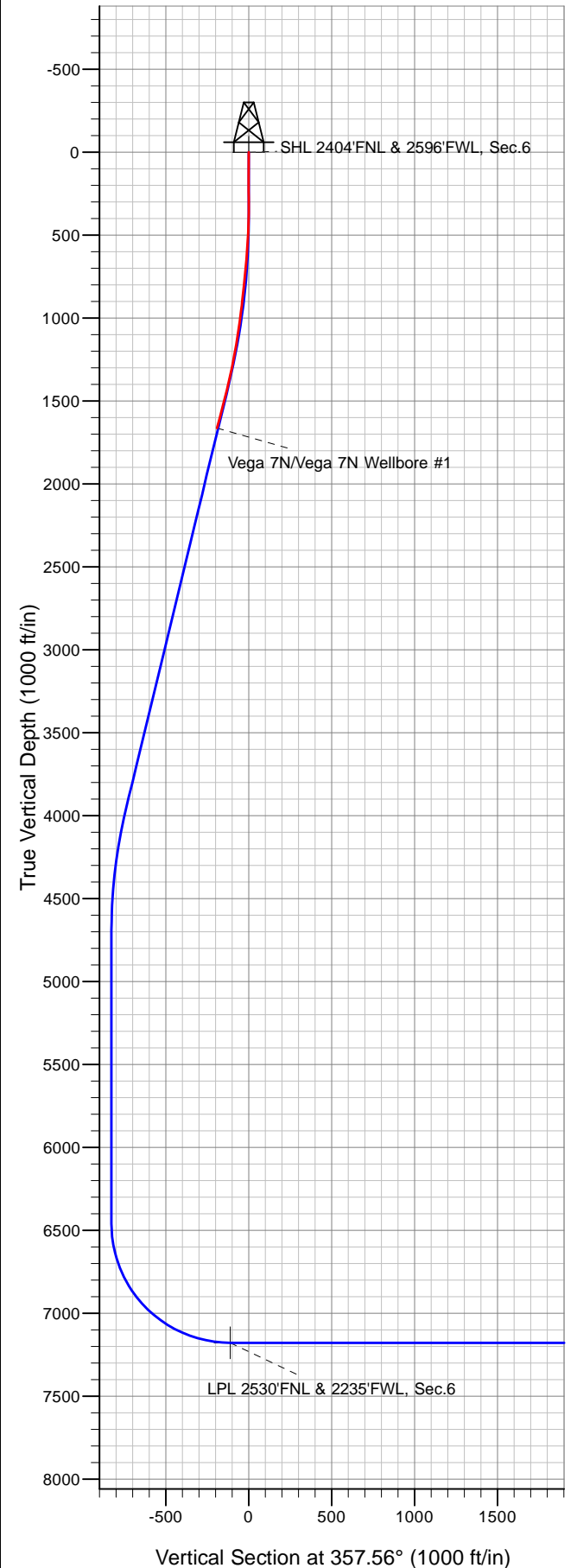


LEGEND

- Vega 7N, Vega 7N Wellbore #1, Plan #1 (8-18-20) V0
- Vega 7N Wellbore #1

Final Survey Plot

Project: SEC.6-T3N-R65W
 Site: Vega 3N65W06 1-16 Pad
 Well: Vega 7N
 Plan: Vega 7N Wellbore #1





PDC Energy Inc. DJ Basin

SEC.6-T3N-R65W

Vega 3N65W06 1-16 Pad

Vega 7N

Vega 7N Wellbore #1

Design: Vega 7N Wellbore #1

Standard Survey Report

02 December, 2020

Company:	PDC Energy Inc. DJ Basin	Local Co-ordinate Reference:	Well Vega 7N
Project:	SEC.6-T3N-R65W	TVD Reference:	WELL @ 4988.0ft (Original Well Elev)
Site:	Vega 3N65W06 1-16 Pad	MD Reference:	WELL @ 4988.0ft (Original Well Elev)
Well:	Vega 7N	North Reference:	True
Wellbore:	Vega 7N Wellbore #1	Survey Calculation Method:	Minimum Curvature
Design:	Vega 7N Wellbore #1	Database:	US_EDM

Project	SEC.6-T3N-R65W		
Map System:	US State Plane 1983	System Datum:	Mean Sea Level
Geo Datum:	North American Datum 1983		Using Well Reference Point
Map Zone:	Colorado Northern Zone		Using geodetic scale factor

Site	Vega 3N65W06 1-16 Pad				
Site Position:		Northing:	1,336,847.37 usft	Latitude:	40.255324
From:	Lat/Long	Easting:	3,221,506.77 usft	Longitude:	-104.706356
Position Uncertainty:	0.0 ft	Slot Radius:	13-3/16 "	Grid Convergence:	0.51 °

Well	Vega 7N					
Well Position	+N/-S	0.0 ft	Northing:	1,336,757.35 usft	Latitude:	40.255077
	+E/-W	0.0 ft	Easting:	3,221,507.91 usft	Longitude:	-104.706355
Position Uncertainty		0.0 ft	Wellhead Elevation:	0.0 ft	Ground Level:	4,975.0 ft

Wellbore	Vega 7N Wellbore #1				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	HDGM	08/18/2020	7.98	66.62	52,045

Design	Vega 7N Wellbore #1				
Audit Notes:					
Version:	1.0	Phase:	ACTUAL	Tie On Depth:	0.0
Vertical Section:	Depth From (TVD) (ft)	+N/-S (ft)	+E/-W (ft)	Direction (°)	
	7,178.0	0.0	0.0	357.56	

Survey Program	Date	12/02/2020			
From (ft)	To (ft)	Survey (Wellbore)	Tool Name	Description	
147.0	1,685.0	Survey #1 (Vega 7N Wellbore #1)	MWD	MWD - Standard	

Survey										
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	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	
147.0	0.53	261.81	147.0	-0.1	-0.7	-0.1	0.36	0.36	0.00	
239.0	0.62	255.48	239.0	-0.3	-1.6	-0.2	0.12	0.10	-6.88	
330.0	0.88	268.84	330.0	-0.4	-2.8	-0.3	0.34	0.29	14.68	
450.0	2.02	231.57	449.9	-1.8	-5.3	-1.5	1.19	0.95	-31.06	
539.0	4.04	209.78	538.8	-5.4	-8.1	-5.1	2.57	2.27	-24.48	
628.0	5.54	193.25	627.5	-12.4	-10.7	-11.9	2.27	1.69	-18.57	
717.0	5.89	195.54	716.1	-20.9	-12.9	-20.4	0.47	0.39	2.57	
806.0	6.16	195.54	804.6	-29.9	-15.4	-29.3	0.30	0.30	0.00	
896.0	6.07	192.37	894.1	-39.2	-17.7	-38.4	0.39	-0.10	-3.52	

Company:	PDC Energy Inc. DJ Basin	Local Co-ordinate Reference:	Well Vega 7N
Project:	SEC.6-T3N-R65W	TVD Reference:	WELL @ 4988.0ft (Original Well Elev)
Site:	Vega 3N65W06 1-16 Pad	MD Reference:	WELL @ 4988.0ft (Original Well Elev)
Well:	Vega 7N	North Reference:	True
Wellbore:	Vega 7N Wellbore #1	Survey Calculation Method:	Minimum Curvature
Design:	Vega 7N Wellbore #1	Database:	US_EDM

Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
985.0	8.00	200.28	982.4	-49.6	-20.8	-48.7	2.42	2.17	8.89
1,070.0	9.76	204.86	1,066.4	-61.7	-25.9	-60.6	2.23	2.07	5.39
1,161.0	9.85	204.86	1,156.0	-75.8	-32.4	-74.3	0.10	0.10	0.00
1,250.0	11.70	199.23	1,243.5	-91.2	-38.6	-89.5	2.39	2.08	-6.33
1,339.0	13.19	203.10	1,330.4	-109.1	-45.6	-107.0	1.92	1.67	4.35
1,429.0	15.12	200.81	1,417.6	-129.5	-53.8	-127.1	2.23	2.14	-2.54
1,519.0	15.74	201.69	1,504.4	-151.8	-62.4	-149.0	0.74	0.69	0.98
1,625.0	16.44	200.46	1,606.2	-179.2	-73.0	-176.0	0.73	0.66	-1.16
1,685.0	16.44	200.46	1,663.8	-195.1	-78.9	-191.6	0.00	0.00	0.00

Checked By: _____	Approved By: _____	Date: _____
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