

Project: Wells Ranch
 Site: A Section 21
 Well: Harper A21-618
 Wellbore: Original Drilling
 Design: APD - Rev 1

Northern Region - DJ Basin

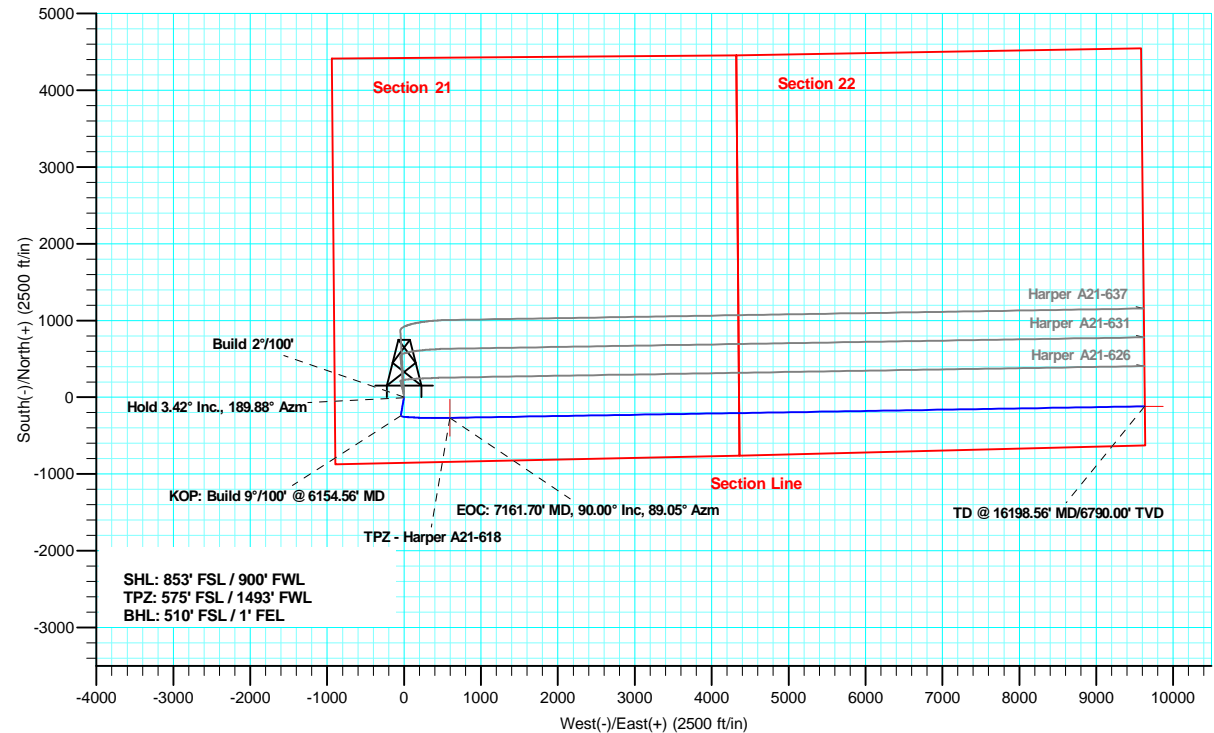
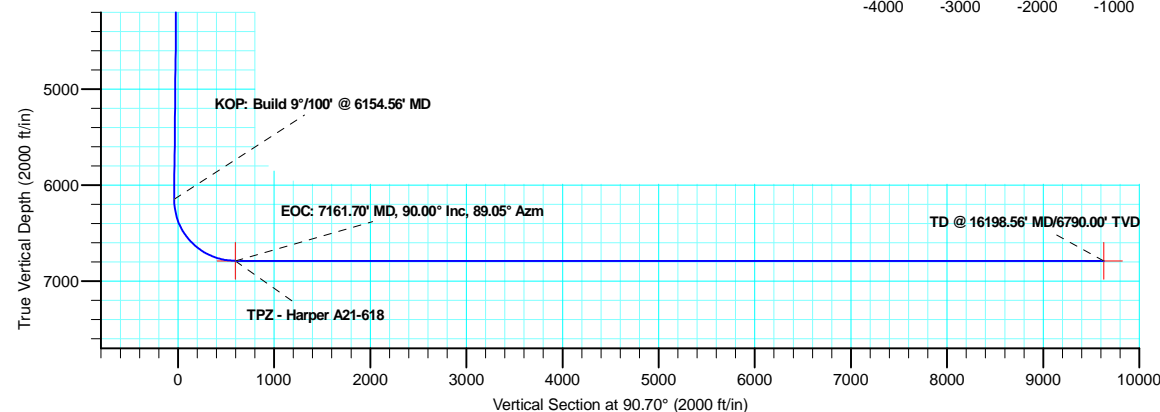
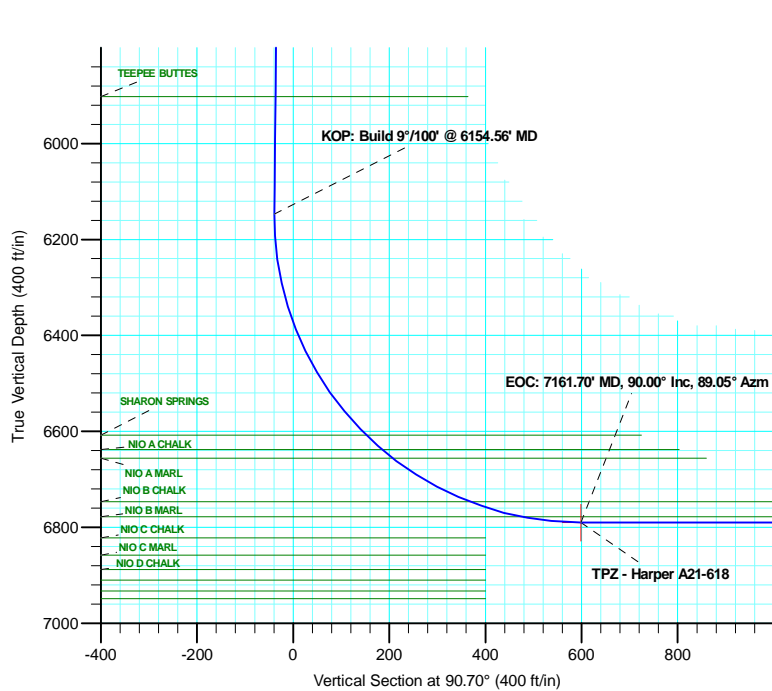
Geodetic System: US State Plane 1983
 Datum: North American Datum 1983
 Ellipsoid: GRS 1980
 Zone: Colorado Northern Zone
 System Datum: Mean Sea Level

SECTION DETAILS

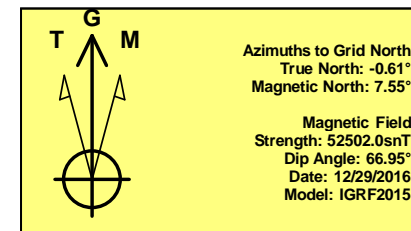
Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	Vsect	Target
1	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
2	2000.00	0.00	0.00	2000.00	0.00	0.00	0.00	0.00	0.00	
3	2171.20	3.42	189.88	2171.09	-5.04	-0.88	2.00	189.88	-0.82	
4	6154.56	3.42	189.88	6147.35	-239.41	-41.70	0.00	0.00	-38.78	
5	7161.70	90.00	89.05	6790.00	-266.66	595.42	9.00	-100.81	598.63	TPZ - Harper A21-618
6	16198.56	90.00	89.05	6790.00	-117.49	9631.04	0.00	0.00	9631.76	BHL - Harper A21-618

WELL DETAILS: Harper A21-618

+N/-S	+E/-W	Northing	Ground Level: Easting	4727.00 Latitude	Longitude	Slot
0.00	0.00	1414201.19	3261147.06	40.4665900	-104.5614040	



OK to submit with 2A as per Noble Drilling 1/23/2018



Plan: APD - Rev 1 (Harper A21-618/Original Drilling)

Created By: Shelly C. Peterkin Date: 8:48, January 23 2018