

Project: Wattenberg Field  
Site: AE (Sec.29-T06N-R62W) Weld County, CO  
Well: Wells Ranch AE30-67-1HNC  
Wellbore: Original Drilling  
Design: APD - Rev 0

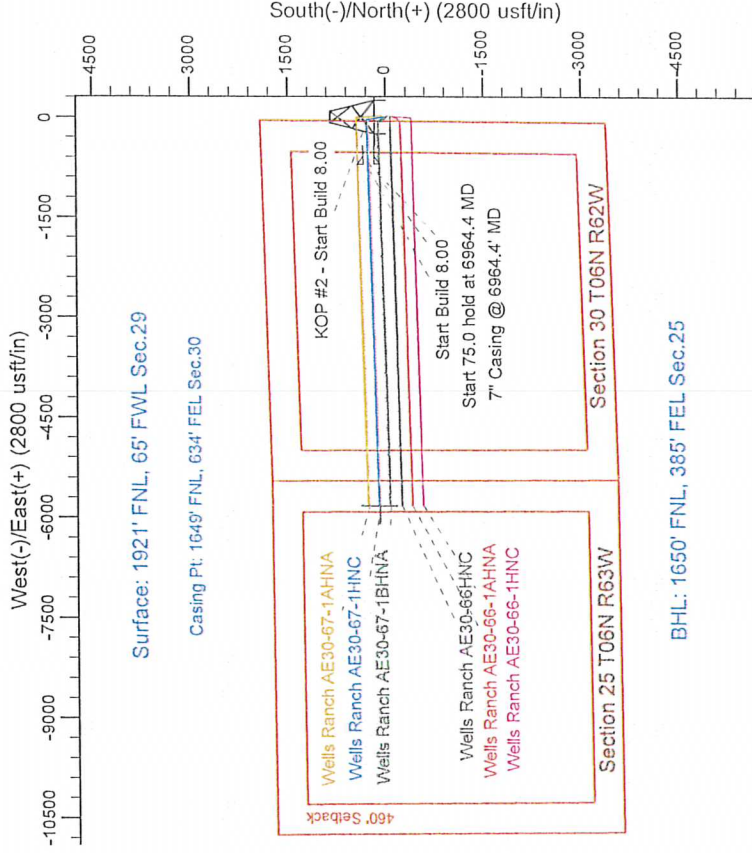
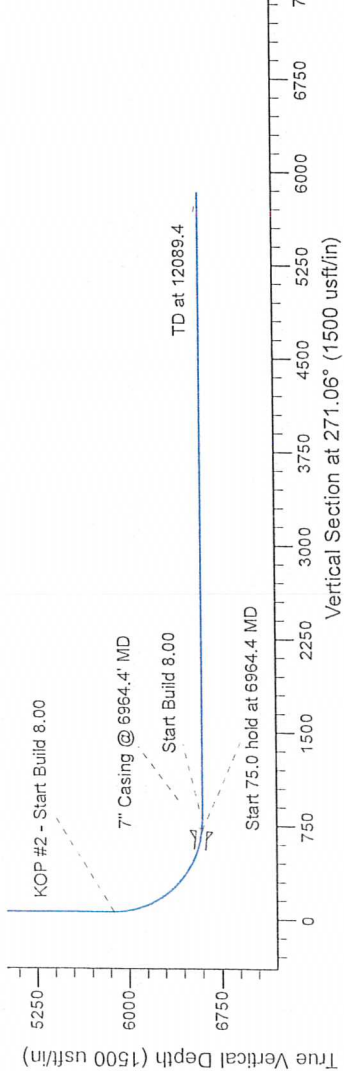
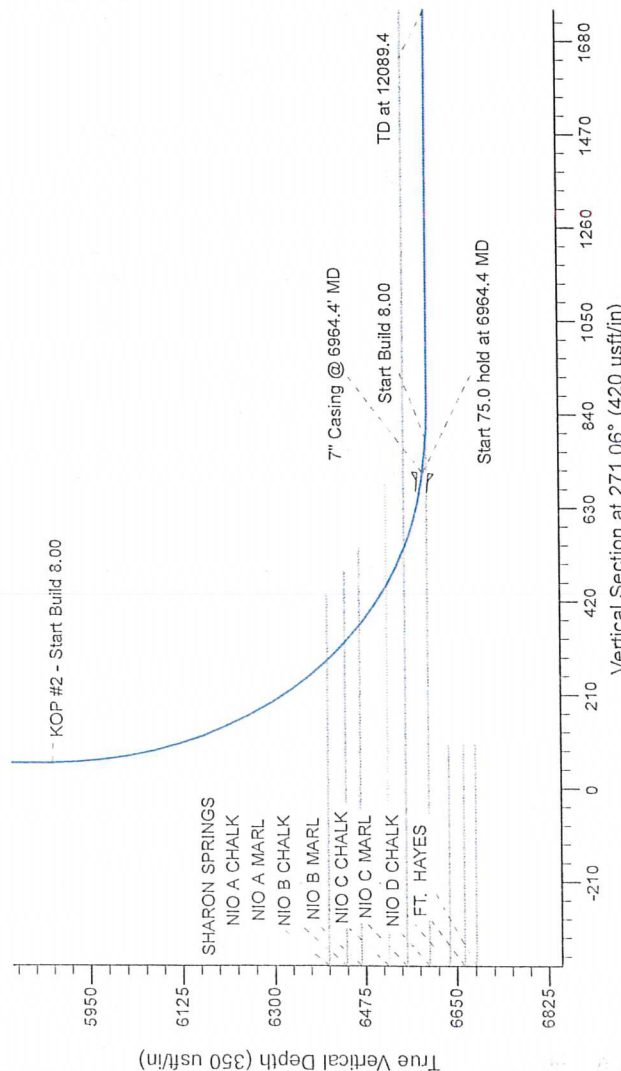
# Northern Region Drilling - Working

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	VSet	Target
1	0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.0	
2	1500.0	0.00	0.00	1500.0	0.0	0.0	0.00	0.00	0.0	
3	2103.1	12.06	349.55	2098.6	62.2	-11.5	2.00	349.55	12.6	
4	2816.6	12.06	349.55	2796.4	208.8	-38.5	0.00	0.00	42.4	
5	3419.6	0.00	0.00	3395.0	271.0	-50.0	2.00	180.00	55.0	
6	5901.9	0.00	0.00	5877.3	271.0	-50.0	0.00	0.00	75.0	
7	6964.4	85.00	288.38	6590.7	252.5	-703.5	8.00	268.38	75.0	
8	7039.4	85.00	288.38	6597.3	250.4	-778.2	0.00	0.00	825.0	
9	7101.9	90.00	288.38	6600.0	246.5	-840.6	0.00	0.00	825.0	
10	12089.4	90.00	288.38	6600.0	107.7	-5826.1	0.00	0.00	5827.1	

Wells Ranch AE30-67-1HNC BHL 1650'FNL, 385'FEL



T  
G  
M

Azimuths to Grid North  
True North: -0.74°  
Magnetic North: 7.55°

Magnetic Field  
Strength: 52992.1snT  
Dip Angle: 67.10°  
Date: 9/20/2013  
Model: IGRF200510

WELL DETAILS: Wells Ranch AE30-67-1HNC			
0.0	0.0	Ground Level: 4765.0	Longitude -104.356080
0.0	1412354.89	Latitude 40.459680	
Plan: APD - Rev 0 (Wells Ranch AE30-67-1HNC/Original Drilling)			
Created By: Shalley Jewell		Date: 11/30, September 23 2013	
Checked:		Date:	
Reviewed:		Date:	
Approved:		Date:	