

Ka

Permit Information:

Well Name: Dragon 36 State No. 8H

Location:

SL: 220' FSL & 685' FEL, Section 36, T-24-S, R-33-E, Lea Co., N.M.

BHL: 230' FNL & 360' FEL, Section 36, T-24-S, R-33-E, Lea Co., N.M.

Casing Program:

Hole Size	Interval	Csg OD	Weight	Grade	Conn	DF _{min} Collapse	DF _{min} Burst	DF _{min} Tension
17.5"	0 – 1230'	13.375"	54.5#	J55	STC	1.125	1.25	1.60
12.25"	0-4000'	9.625"	40#	J55	LTC	1.125	1.25	1.60
12.25"	4000' – 5100'	9.625"	40#	HCK-55	LTC	1.125	1.25	1.60
8.75"	0'-14,118'	5.5"	17#	HCP-110	LTC	1.125	1.25	1.60

Cement Program:

Depth	No. Sacks	Wt. ppg	Yld Ft ³ /ft	Slurry Description
1230'	500	13.5	1.73	Class C + 4.0% Bentonite + 0.6% CD-32 + 0.5% CaCl ₂ + 0.25 lb/sk Cello-Flake (TOC @ Surface)
	200	14.8	1.34	Class C + 0.6% FL-62 + 0.25 lb/sk Cello-Flake + 0.2% Sodium Metasilicate
5,100'	800	12.7	2.22	Class 'C' + 1.50% R-3 + 0.25 lb/sk Cello-Flake + 2.0% Sodium Metasilicate + 10% Salt + 0.005 lb/sk Static Free
	200	14.8	1.32	Tail: Class 'C' + 0.25 lb/sk Cello Flake + 0.005 lb/sk Static Free
14,118'	375	10.8	3.67	60:40:0 Class C + 15.0 pps BA-90 + 4% MPA-5 + 3.0% SMS + 5.0% A-10 + 1.0% BA-10A + 0.80% ASA-301 + 2.55% R-21 + 8.0 pps LCM-1
	400	11.8	2.38	50:50:10 Class H + 0.80% FL-52 + 0.30% ASA-301 + 0.40% SMS + 2.0% Salt + 0.30% R-21 + 3.0 pps LCM-1 + 0.25 pps Celloflake
	1300	14.2	1.28	50:50:2 Class H + 0.65% FL-52 + 0.45% CD-32 + 0.10% SMS + 2.0% Salt

Mud Program:

Depth	Type	Weight (ppg)	Viscosity	Water Loss
0 – 1230'	Fresh - Gel	8.6-8.8	28-34	N/c
1230' – 5,100'	Brine	10.0-10.2	28-34	N/c
5,100' – 8,972'	Cut Brine	8.4-9.0	28-34	N/c
KOP – 14,118' Lateral	Cut Brine	9.0-9.5	40-42	8-10

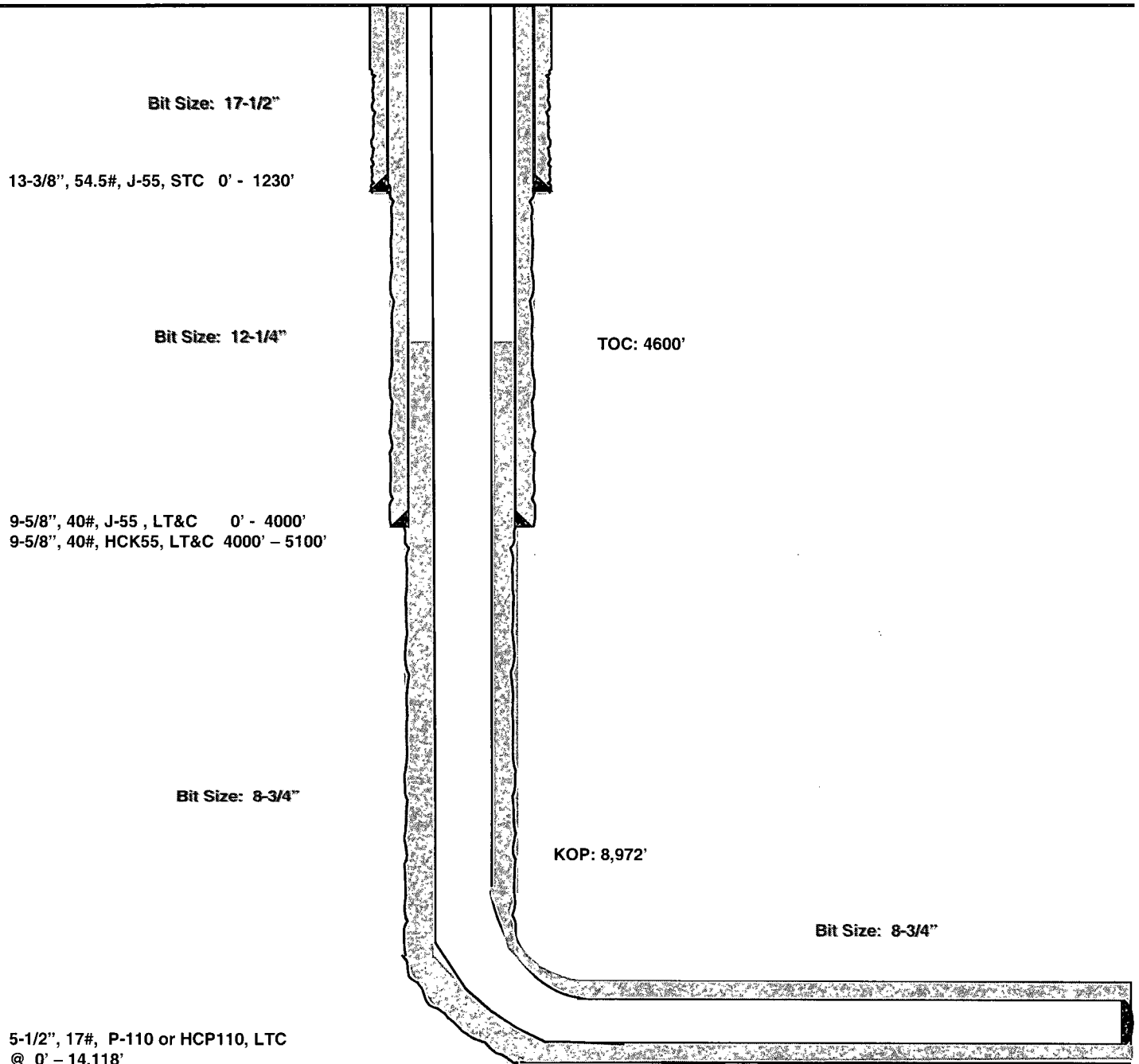
Dragon 36 State #8H
Pitchfork Ranch
Lea County, New Mexico

220' FSL
685' FEL
Section 36
T-24-S, R-33-E

Proposed Wellbore

API: 30-025-40930

KB: 3,509'
GL: 3,479'



Lateral: 14,118' MD, 9,450' TVD

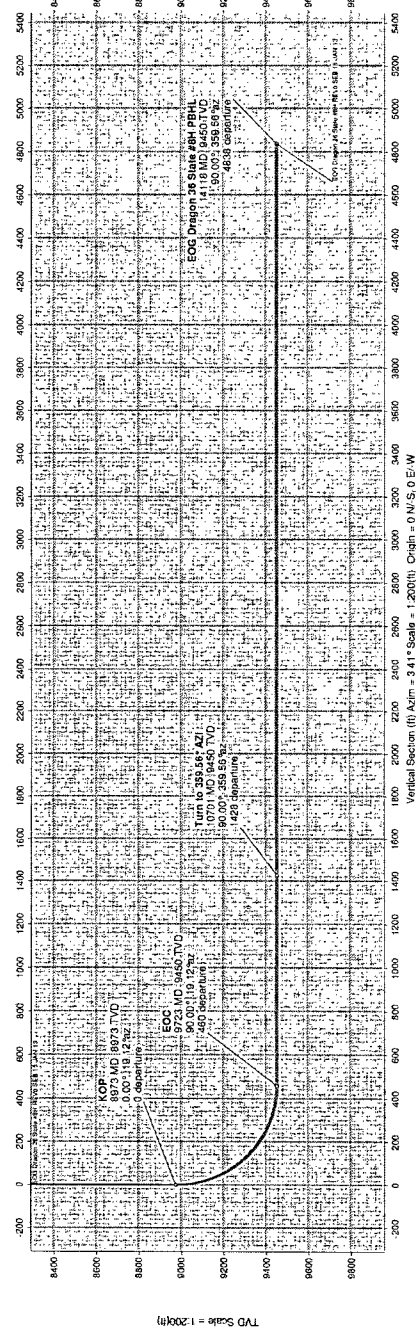
BH Location: 230' FNL & 360' FEL
Section 36
T-24-S, R-33-E

Eog Resources

Legend



Critical Points													
Comments	Survey (NAD83)	Iteration (NAD83)	Altitude (NAD83)	7TM (NAD83)	Sub Sea TID (NAD83)	WGS84	EDM	Latitude (NAD83)	Longitude (NAD83)	Easting (NAD83)	Northing (NAD83)	U.S. (NAD83)	
Tide-H	0.00	0.00	19.12	0.00	-5398.00	0.00	0.00	N 32.0	W 103.0	9.276	751908.00	425330.00	19.12
KOP	8972.54	0.00	19.12	8972.54	5465.54	0.00	0.00	N 32.0	W 103.0	9.276	751908.00	425330.00	19.12
ECG	9722.54	90.00	19.12	9453.00	594.00	459.54	451.50	N 32.0	W 103.0	6.650	732694.50	425861.12	19.12
Turn to 353.55° AZ	10700.52	90.00	359.55	9453.00	594.00	427.77	441.55	N 32.0	W 103.0	5.465	732222.24	425841.53	19.12
ECG (Depth to Star 484° PBL)	14118.26	90.00	359.55	9453.00	594.00	4607.68	4822.00	N 32.0	W 103.0	5.500	732146.00	426563.00	19.12



Drawn By: Sam Bille
Date Created: January 16, 2013 01:50:42 PM
Checked By:
Checked Date:
Approved By:



EOG Dragon 36 State #8H REV0 SEB 15-JAN-13 Proposal Geodetic Report



(Def Plan)

Report Date: January 15, 2013 - 01:49 PM
Client: Eog Resources
Field: NM Lea County (NAD 27)
Structure / Slot: EOG Dragon 36 State #8H / EOG Dragon 36 State #8H
Well: EOG Dragon 36 State #8H
Borehole: Original Borehole
UWI / API#: Unknown / Unknown
Survey Name: EOG Dragon 36 State #8H REV0 SEB 15-JAN-13
Survey Date: January 15, 2013
Tort / AHD / DDI / ERD Ratio: 109.562 ° / 4873.184 ft / 5.902 / 0.516
Coordinate Reference System: NAD27 New Mexico State Plane, Eastern Zone, US Feet
Location Lat / Long: N 32° 10' 2.20651", W 103° 31' 9.27643"
Location Grid N/E Y/X: N 425530.000 ftUS, E 751908.000 ftUS
CRS Grid Convergence Angle: 0.4334 °
Grid Scale Factor: 0.99998177

Survey / DLS Computation: Minimum Curvature / Lubinski
Vertical Section Azimuth: 3.413 ° (Grid North)
Vertical Section Origin: 0.000 ft, 0.000 ft
TVD Reference Datum: KB
TVD Reference Elevation: 3509.000 ft above
Seabed / Ground Elevation: 3479.000 ft above
Magnetic Declination: 7.465 °
Total Gravity Field Strength: 999.1520 mgn (9.8 based)
Total Magnetic Field Strength: 48411.641 nT
Magnetic Dip Angle: 60.063 °
Declination Date: January 15, 2013
Magnetic Declination Model: BGGM 2012
North Reference: Grid North
Grid Convergence Used: 0.4334 °
Total Corr Mag North->Grid North: 7.0315 °
Local Coord Referenced To: Structure Reference Point

Comments	MD (ft)	Incl (°)	Azim Grid (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (N/S ° ' ")	Longitude (E/W ° ' ")
Tie-In	0.00	0.00	19.12	0.00	0.00	0.00	0.00	N/A	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	100.00	0.00	19.12	100.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	200.00	0.00	19.12	200.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	300.00	0.00	19.12	300.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	400.00	0.00	19.12	400.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	500.00	0.00	19.12	500.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	600.00	0.00	19.12	600.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	700.00	0.00	19.12	700.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	800.00	0.00	19.12	800.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	900.00	0.00	19.12	900.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	1000.00	0.00	19.12	1000.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	1100.00	0.00	19.12	1100.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	1200.00	0.00	19.12	1200.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	1300.00	0.00	19.12	1300.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	1400.00	0.00	19.12	1400.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	1500.00	0.00	19.12	1500.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	1600.00	0.00	19.12	1600.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	1700.00	0.00	19.12	1700.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	1800.00	0.00	19.12	1800.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	1900.00	0.00	19.12	1900.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	2000.00	0.00	19.12	2000.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	2100.00	0.00	19.12	2100.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	2200.00	0.00	19.12	2200.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	2300.00	0.00	19.12	2300.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	2400.00	0.00	19.12	2400.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	2500.00	0.00	19.12	2500.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	2600.00	0.00	19.12	2600.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	2700.00	0.00	19.12	2700.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	2800.00	0.00	19.12	2800.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	2900.00	0.00	19.12	2900.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	3000.00	0.00	19.12	3000.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	3100.00	0.00	19.12	3100.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	3200.00	0.00	19.12	3200.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	3300.00	0.00	19.12	3300.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	3400.00	0.00	19.12	3400.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	3500.00	0.00	19.12	3500.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	3600.00	0.00	19.12	3600.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	3700.00	0.00	19.12	3700.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	3800.00	0.00	19.12	3800.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	3900.00	0.00	19.12	3900.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	4000.00	0.00	19.12	4000.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	4100.00	0.00	19.12	4100.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	4200.00	0.00	19.12	4200.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	4300.00	0.00	19.12	4300.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	4400.00	0.00	19.12	4400.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	4500.00	0.00	19.12	4500.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	4600.00	0.00	19.12	4600.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	4700.00	0.00	19.12	4700.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	4800.00	0.00	19.12	4800.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	4900.00	0.00	19.12	4900.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	5000.00	0.00	19.12	5000.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	5100.00	0.00	19.12	5100.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	5200.00	0.00	19.12	5200.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	5300.00	0.00	19.12	5300.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	5400.00	0.00	19.12	5400.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	5500.00	0.00	19.12	5500.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	5600.00	0.00	19.12	5600.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	5700.00	0.00	19.12	5700.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	5800.00	0.00	19.12	5800.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28
	5900.00	0.00	19.12	5900.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21 W 103 31	9.28

Comments	MD (ft)	Incl (°)	Azim Grid (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (N/S ° ' ")	Longitude (E/W ° ' ")
	6000.00	0.00	19.12	6000.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	6100.00	0.00	19.12	6100.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	6200.00	0.00	19.12	6200.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	6300.00	0.00	19.12	6300.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	6400.00	0.00	19.12	6400.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	6500.00	0.00	19.12	6500.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	6600.00	0.00	19.12	6600.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	6700.00	0.00	19.12	6700.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	6800.00	0.00	19.12	6800.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	6900.00	0.00	19.12	6900.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	7000.00	0.00	19.12	7000.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	7100.00	0.00	19.12	7100.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	7200.00	0.00	19.12	7200.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	7300.00	0.00	19.12	7300.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	7400.00	0.00	19.12	7400.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	7500.00	0.00	19.12	7500.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	7600.00	0.00	19.12	7600.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	7700.00	0.00	19.12	7700.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	7800.00	0.00	19.12	7800.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	7900.00	0.00	19.12	7900.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	8000.00	0.00	19.12	8000.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	8100.00	0.00	19.12	8100.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	8200.00	0.00	19.12	8200.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	8300.00	0.00	19.12	8300.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	8400.00	0.00	19.12	8400.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	8500.00	0.00	19.12	8500.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	8600.00	0.00	19.12	8600.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	8700.00	0.00	19.12	8700.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	8800.00	0.00	19.12	8800.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	8900.00	0.00	19.12	8900.00	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
KOP	8972.54	0.00	19.12	8972.54	0.00	0.00	0.00	0.00	425530.00	751908.00	N 32 10 2.21	W 103 31 9.28
	9000.00	3.30	19.12	8999.98	0.76	0.75	0.26	12.00	425530.75	751908.26	N 32 10 2.21	W 103 31 9.27
	9100.00	15.30	19.12	9098.49	16.28	15.98	5.54	12.00	425545.98	751913.54	N 32 10 2.36	W 103 31 9.21
	9200.00	27.30	19.12	9191.49	51.18	50.23	17.41	12.00	425580.23	751925.41	N 32 10 2.70	W 103 31 9.07
	9300.00	39.30	19.12	9274.93	103.93	102.00	35.36	12.00	425632.00	751943.36	N 32 10 3.21	W 103 31 8.86
	9400.00	51.30	19.12	9345.14	172.22	169.03	58.60	12.00	425699.03	751966.60	N 32 10 3.87	W 103 31 8.58
	9500.00	63.30	19.12	9399.08	253.08	248.39	86.11	12.00	425778.39	751994.11	N 32 10 4.66	W 103 31 8.25
	9600.00	75.30	19.12	9434.37	342.96	336.61	116.69	12.00	425866.61	752024.69	N 32 10 5.53	W 103 31 7.89
	9700.00	87.30	19.12	9449.47	437.95	429.84	149.01	12.00	425959.83	752057.01	N 32 10 6.45	W 103 31 7.51
EOC	9722.54	90.00	19.12	9450.00	459.64	451.13	156.39	12.00	425981.12	752064.39	N 32 10 6.66	W 103 31 7.42
	9800.00	90.00	17.57	9450.00	534.48	524.65	180.77	2.00	426054.64	752088.77	N 32 10 7.38	W 103 31 7.13
	9900.00	90.00	15.57	9450.00	631.85	620.49	209.29	2.00	426150.48	752117.29	N 32 10 8.33	W 103 31 6.79
	10000.00	90.00	13.57	9450.00	729.95	717.27	234.45	2.00	426247.25	752142.44	N 32 10 9.29	W 103 31 6.49
	10100.00	90.00	11.57	9450.00	828.67	814.86	256.21	2.00	426344.85	752164.21	N 32 10 10.25	W 103 31 6.22
	10200.00	90.00	9.57	9450.00	927.89	913.16	274.55	2.00	426443.14	752182.55	N 32 10 11.22	W 103 31 6.00
	10300.00	90.00	7.57	9450.00	1027.48	1012.04	289.46	2.00	426542.02	752197.45	N 32 10 12.20	W 103 31 5.82
	10400.00	90.00	5.57	9450.00	1127.32	1111.38	300.90	2.00	426641.36	752208.89	N 32 10 13.18	W 103 31 5.68
	10500.00	90.00	3.57	9450.00	1227.30	1211.06	308.87	2.00	426741.03	752216.86	N 32 10 14.17	W 103 31 5.58
	10600.00	90.00	1.57	9450.00	1327.28	1310.95	313.35	2.00	426840.92	752221.35	N 32 10 15.16	W 103 31 5.52
	10700.00	90.00	359.57	9450.00	1427.15	1410.94	314.35	2.00	426940.91	752222.34	N 32 10 16.14	W 103 31 5.50
Turn to 359.56° AZI	10700.62	90.00	359.56	9450.00	1427.77	1411.56	314.34	2.00	426941.53	752222.34	N 32 10 16.15	W 103 31 5.50
	10800.00	90.00	359.56	9450.00	1526.93	1510.94	313.58	0.00	427040.91	752212.57	N 32 10 17.13	W 103 31 5.50
	10900.00	90.00	359.56	9450.00	1626.70	1610.93	312.81	0.00	427140.90	752220.80	N 32 10 18.12	W 103 31 5.50
	11000.00	90.00	359.56	9450.00	1726.47	1710.93	312.04	0.00	427240.90	752220.03	N 32 10 19.11	W 103 31 5.50
	11100.00	90.00	359.56	9450.00	1826.25	1810.93	311.27	0.00	427340.89	752219.26	N 32 10 20.10	W 103 31 5.50
	11200.00	90.00	359.56	9450.00	1926.02	1910.93	310.50	0.00	427440.89	752218.49	N 32 10 21.09	W 103 31 5.50
	11300.00	90.00	359.56	9450.00	2025.79	2010.92	309.73	0.00	427540.88	752217.72	N 32 10 22.08	W 103 31 5.50
	11400.00	90.00	359.56	9450.00	2125.57	2110.92	308.95	0.00	427640.88	752216.95	N 32 10 23.07	W 103 31 5.50
	11500.00	90.00	359.56	9450.00	2225.34	2210.92	308.18	0.00	427740.87	752216.18	N 32 10 24.06	W 103 31 5.50
	11600.00	90.00	359.56	9450.00	2325.12	2310.91	307.41	0.00	427840.87	752215.41	N 32 10 25.05	W 103 31 5.50
	11700.00	90.00	359.56	9450.00	2424.89	2410.91	306.64	0.00	427940.86	752214.64	N 32 10 26.04	W 103 31 5.50
	11800.00	90.00	359.56	9450.00	2524.66	2510.91	305.87	0.00	428040.86	752213.87	N 32 10 27.03	W 103 31 5.50
	11900.00	90.00	359.56	9450.00	2624.44	2610.90	305.10	0.00	428140.85	752213.10	N 32 10 28.02	W 103 31 5.50
	12000.00	90.00	359.56	9450.00	2724.21	2710.90	304.33	0.00	428240.85	752212.32	N 32 10 29.01	W 103 31 5.50
	12100.00	90.00	359.56	9450.00	2823.99	2810.90	303.56	0.00	428340.84	752211.55	N 32 10 30.00	W 103 31 5.50
	12200.00	90.00	359.56	9450.00	2923.76	2910.90	302.79	0.00	428440.84	752210.78	N 32 10 30.99	W 103 31 5.50
	12300.00	90.00	359.56	9450.00	3023.53	3010.89	302.02	0.00	428540.83	752210.01	N 32 10 31.98	W 103 31 5.50
	12400.00	90.00	359.56	9450.00	3123.31	3110.89	301.25	0.00	428640.83	752209.24	N 32 10 32.97	W 103 31 5.50
	12500.00	90.00	359.56	9450.00	3223.08	3210.89	300.48	0.00	428740.82	752208.47	N 32 10 33.96	W 103 31 5.50
	12600.00	90.00	359.56	9450.00	3322.85	3310.88	299.71	0.00	428840.82	752207.70	N 32 10 34.95	W 103 31 5.50
	12700.00	90.00	359.56	9450.00	3422.63	3410.88	298.94	0.00	428940.81	752206.93	N 32 10 35.94	W 103 31 5.50
	12800.00	90.00	359.56	9450.00	3522.40	3510.88	298.17	0.00	429040.81	752206.16	N 32 10 36.93	W 103 31 5.50
	12900.00	90.00	359.56	9450.00	3622.18	3610.87	297.39	0.00	429140.80	752205.39	N 32 10 37.91	W 103 31 5.50
	13000.00	90.00	359.56	9450.00	3721.95	3710.87	296.62	0.00	429240.80	752204.62	N 32 10 38.90	W 103 31 5.50
	13100.00	90.00	359.56	9450.00	3821.72	3810.87	295.85	0.00	429340.79	752203.85	N 32 10 39.89	W 103 31 5.50
	13200.00	90.00	359.56	9450.00	3921.50	3910.87	295.08	0.00	429440.79	752203.08	N 32 10 40.88	W 103 31 5.50
	13300.00	90.00	359.56	9450.00	4021.27	4010.86	294.31	0.00	429540.78	752202.31	N 32 10 41.87	W 103 31 5.50
	13400.00	90.00	359.56	9450.00	4121.04	4110.86	293.54	0.00	429640.78	752201.54	N 32 10 42.86	W 103 31 5.50

Comments	MD (ft)	Incl (°)	Azim Grid (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS ("/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (N/S ° ' ")	Longitude (E/W ° ' ")
	14100.00	90.00	359.56	9450.00	4819.46	4810.84	288.15	0.00	430340.74	752196.14	N 32 10 49.79	W 103 31 5.50
EOG Dragon 36 State #8H PBHL	14118.26	90.00	359.56	9450.00	4837.68	4829.10	288.01	0.00	430359.00	752196.00	N 32 10 49.97	W 103 31 5.50

Survey Type: Def Plan

Survey Error Model: ISCWSA Rev 0 *** 3-D 95.000% Confidence 2.7955 sigma
Survey Program:

Description	MD From (ft)	MD To (ft)	EOU Freq (ft)	Hole Size (in)	Casing Diameter (in)	Survey Tool Type	Borehole / Survey
	0.000	30.000	1/100.000	30.000	30.000	SLB_MWD-STD-Depth Only	Original Borehole / EOG Dragon 36 State #8H REV0 SEB 15-JAN-
	30.000	14118.259	1/100.000	30.000	30.000	SLB_MWD-STD	Original Borehole / EOG Dragon 36 State #8H REV0 SEB 15-JAN-

EOG RESOURCES, INC.
DRAGON 36 STATE #8H

Hydrogen Sulfide Plan Summary

- A. All personnel shall receive proper H₂S training in accordance with Onshore Order III.C.3.a.
- B. Briefing Area: two perpendicular areas will be designated by signs and readily accessible.
- C. Required Emergency Equipment:

- Well control equipment
 - a. Flare line 150' from wellhead to be ignited by flare gun.
 - b. Choke manifold with a remotely operated choke.
 - c. Mud/gas separator

- Protective equipment for essential personnel.

Breathing apparatus:

- a. Rescue Packs (SCBA) — 1 unit shall be placed at each breathing area, 2 shall be stored in the safety trailer.
- b. Work/Escapes packs — 4 packs shall be stored on the rig floor with sufficient air hose not to restrict work activity.
- c. Emergency Escape Packs — 4 packs shall be stored in the doghouse for emergency evacuation.

Auxiliary Rescue Equipment:

- a. Stretcher
- b. Two OSHA full body harness
- c. 100 ft 5/8 inch OSHA approved rope
- d. 1-20# class ABC fire extinguisher

- H₂S detection and monitoring equipment:

The stationary detector with three sensors will be placed in the upper dog house if equipped, set to visually alarm @ 10 ppm and audible @ 14 ppm. Calibrate a minimum of every 30 days or as needed. The sensors will be placed in the following places: Rig floor / Bell nipple / End of flow line or where well bore fluid is being discharged.

(Gas sample tubes will be stored in the safety trailer)

- Visual warning systems.
 - a. One color code condition sign will be placed at the entrance to the site reflecting the possible conditions at the site.
 - b. A colored condition flag will be on display, reflecting the current condition at the site at the time.
 - c. Two wind socks will be placed in strategic locations, visible from all angles.

EOG RESOURCES, INC.
DRAGON 36 STATE #8H

■ **Mud program:**

The mud program has been designed to minimize the volume of H₂S circulated to surface. The operator will have the necessary mud products to minimize hazards while drilling in H₂S bearing zones.

■ **Metallurgy:**

- a. All drill strings, casings, tubing, wellhead, blowout preventer, drilling spool, kill lines, choke manifold and lines, and valves shall be suitable for H₂S service.
- b. All elastomers used for packing and seals shall be H₂S trim.

■ **Communication:**

Communication will be via cell phones and land lines where available.

**EOG RESOURCES, INC.
DRAGON 36 STATE #8H**

Emergency Assistance Telephone List

PUBLIC SAFETY: **911 or**

Lea County Sheriff's Department	(575) 396-3611
Rod Coffman	
Fire Department:	
Carlsbad	(575) 885-3125
Artesia	(575) 746-5050
Hospitals:	
Carlsbad	(575) 887-4121
Artesia	(575) 748-3333
Hobbs	(575) 392-1979
Dept. of Public Safety/Carlsbad	(575) 748-9718
Highway Department	(575) 885-3281
New Mexico Oil Conservation	(575) 476-3440
U.S. Dept. of Labor	(575) 887-1174

EOG Resources, Inc.

EOG / Midland	Office (432) 686-3600
---------------	-----------------------

Company Drilling Consultants:

Danny Kiser Will Henderson	Cell (432) 894-3417
Larry King	

Drilling Engineer

Steve Munsell	Office (432) 686-3609
	Cell (432) 894-1256

Operations Manager

Travis Lain	Office (432) 686-3740
	Cell (432) 254-3521

Drilling Superintendents

Ron Welch	Office (432) 686-3695
	Cell (432) 386-0592
Barney Thompson	Office (432) 686-3678
	Cell (432) 254-9056

Cactus Drilling

Cactus Drilling	Office (580) 799-2752
Cactus 123 Drilling Rig	Rig (432) 894-3417

Tool Pusher:

Jack Herndon	Cell (405) 519-6552
Larry Slife	Cell (405) 250-6368

Safety

James Fischer (HSE Manager)	Office (432) 686-3747
	Cell (817) 253-3725
Brian Chandler	Cell (806) 777-8814
Terry Maxwell (Consultant)	Cell (432) 349-6926