

Results of Directional Survey

API number:	30-025-39021		
OGRID:		Operator:	COG OPERATING LLC
		Property:	BC FEDERAL # 35

surface	ULSTR:	E	19	T	17S	R	32E
			2510	FNL		330	FWL

BH Loc	ULSTR:	E	19	T	17S	R	32E
			2254	FNL		379	FWL

Top Perf/OH	ULSTR:	E	19	T	17S	R	32E
		5860		2282	FNL		378
					FWL		

Bot Perf/OH	ULSTR:	E	19	T	17S	R	32E
		6600		2261	FNL		379
					FWL		

	MD	N/S	E/W	VD
	5184	208.20	47.54	5177.05
TOP PERFS/OH	5860	227.88	48.14	5852.75
	5229	209.51	47.58	5222.03
	5184	208.20	47.54	5177.05
BOT PERFS/OH	6600	249.42	48.80	6592.42
	5229	209.51	47.58	5222.03

NEXT TO LAST	5184	208.20	47.54	5177.05
LAST READING	5229	209.51	47.58	5222.03
TD	6825	255.97	49.00	6817.32

Surface Location	2510	FN	330	FW
Projected BHL	2254	FN	379	FW
Location of				
Top Perfs/OH	2282	FN	378	FW
Bottom Perfs/OH	2261	FN	379	FW

SUMMARY of Subsurface Locations

Surface Location	E-19-17S-32E	2510	FN	330	FW	Vert. Depth
Top Perfs/OH	E-19-17S-32E	2282	FN	378	FW	5852.75
Bottom Perfs/OH	E-19-17S-32E	2261	FN	379	FW	6592.42
Projected TD	E-19-17S-32E	2254	FN	379	FW	6817.32