PD83 PT-04A

From (m)	To (m)	
0	4.6	Dolerite, highly to extremely weathered (orange clay), minor quartz and thermally metamorphosed mudstone - scree deposit.
4.6	5.6	Arenite, lithic, highly weathered
5.6	6.8	Mudstone, highly weathered
6.8	7.8	Coal, (RD ≈ 1.65), (not seen in cuttings
7.8	8.2	Mudstone, highly weathered
8.2	16.3	Arenite, lithic, medium grained, moderately/ slightly weathered
16.3	16.8	Coal, (RD ≈ 1.58)
16.8	17.6	Mudstone, carbonaceous
17.6	18.4	Coal (RD ≈ 1.65)
18.4	≈19.0	Mudstone, transitional to siltstone
≈19.00	≈20.0	Siltstone, transitional to very fine grained lithic arenite
≈20.00	23.5	Coal/carbonaceous mudstone, variable metamorphosed; poor sample recovery and strong water flow preclude estimation of proportion of coal in the interval
23.5	24.0	Dolerite, chilled margin, turquoise green, veinlets of calcite, very minor fluorite
24.0	26.0	Dolerite, fine grained
26.0	40.0	Dolerite, medium grained
40.0	46.5	Dolerite, fine grained and chilled margin (as for 23.5-24m)
46.5	48.0	Mudstone, grey and carbonaceous
48.0	51.0	Mudstone, grey, transitional to siltstone
51.0	52.0	Arenite, lithic, very soft
		EOH

Comments

(i) Base of oxidation ≈12.0m but oxidation above this depth is not uniform (see Long Spaced Density Log)

(ii) The combined effects of dolerite scree, excessive use of the hammer bit and the dolerite intrusive, with associated 2000 gph water flow, caused severe caving of the hole and resulted in extremely poor sample returns, (and those recovered were badly contaminated.)

(iii) Coal seams encountered were as follows:
Major: 6.8-7.8m, ? and within the 20-23.5 interval;
Medium: 16.3-16.8m, 17.6 - 18.4m.

(iv) The dolerite intrusive is interpreted as a steep dipping dyke.