

THE SHELL COMPANY OF AUSTRALIA LTD.

BOREHOLE LITHOLOGICAL DESCRIPTION

GRAY

GY 22

HOLE TYPE	CORE
EASTING	601,100 M AM GRID
NORTHING	5,375,900 M AM GRID
ELEVATION	270.00 M
TOTAL DEPTH DRILLED	319.80 M
DRILLING STARTED	24/ 1/80
DRILLING TIME	
CORE SIZE	
HOLE SIZE	
LENGTH CASED	
INITIAL WATER LEVEL	
WATER LEVEL AT GEOPHYSICAL LOGGING	
DRILLING FLUID	
DRILLING CONTRACTOR	
GEOPHYSICAL LOGGING CONTRACTOR	
LITHOLOGICAL DESCRIPTION BY	
INFORMATION AVAILABLE :	SAMPLES TAKEN ANALYTICAL DATA LITHOLOGICAL DESCRIPTION
PETROPHYSICAL WIRELINE LOGS RUN :	

*** FRAME K07***

BOREHOLE : GY 22

DEPTH TO BASE M	THICKNESS M	REC %	SAMPLE NUMBER	ROCK TYPE	GEOLOGICAL DESCRIPTION
0.45	0.45			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, MODERATELY WEATHERED, STRONG ROCK.
3.00	2.55			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
3.15	0.15			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, MODERATELY WEATHERED, STRONG ROCK.
4.00	0.85			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
4.58	0.58			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, HIGHLY WEATHERED, MODERATELY STRONG ROCK.
6.00	1.42			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
6.31	0.31			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, MODERATELY WEATHERED, STRONG ROCK.
6.44	0.13			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
6.85	0.41			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, MODERATELY WEATHERED, STRONG ROCK.
7.50	0.65			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
8.74	1.24			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, MODERATELY WEATHERED, STRONG ROCK.
9.30	0.56			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
9.80	0.50			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, MODERATELY WEATHERED, STRONG ROCK.
10.67	0.87			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, MODERATELY WEATHERED, STRONG ROCK.
10.80	0.13			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
13.49	2.69			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, MODERATELY WEATHERED, STRONG ROCK.
13.80	0.31			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
15.67	1.87			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, HIGHLY WEATHERED, MODERATELY STRONG ROCK.
16.80	1.13			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
17.70	0.90			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, MODERATELY WEATHERED, STRONG ROCK.
18.40	0.70			100% DOLERITE	SCREE, FERRUGINOUS, GREY-BROWN, HIGHLY WEATHERED.
19.80	1.40			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
22.64	2.84			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, MODERATELY WEATHERED, STRONG ROCK.
22.80	0.16			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
25.01	2.21			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, MODERATELY WEATHERED, STRONG ROCK.

DEPTH TO BASE M	THICKNESS M	REC X	SAMPLE NUMBER	ROCK TYPE	GEOLOGICAL DESCRIPTION *** CORE DESCRIPTION ***
25.80	0.79			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
27.33	1.53			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, HIGHLY WEATHERED, MODERATELY STRONG ROCK.
27.40	0.07			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
29.68	2.28			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, HIGHLY WEATHERED, MODERATELY STRONG ROCK.
29.80	0.12			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
29.94	0.14			100% DOLERITE	SCREE, GREY, HIGHLY WEATHERED.
30.50	0.56			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, SLIGHTLY WEATHERED, STRONG ROCK.
30.83	0.33			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, SLIGHTLY WEATHERED.
31.80	0.97			100% DOLERITE	SCREE, ORANGE-BROWN, COMPLETELY WEATHERED.
34.40	2.60			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, SLIGHTLY WEATHERED, VERY STRONG ROCK.
34.78	0.38			100% DOLERITE	SCREE, MED.-COARSE GRAINED, GREY, UNWEATHERED.
37.75	2.97			100% DOLERITE	SCREE, GREY, UNWEATHERED, VERY STRONG ROCK.
38.97	1.22			100% DOLERITE	SCREE, GREY, SLIGHTLY WEATHERED, VERY STRONG ROCK.
39.84	0.87			100% DOLERITE	SCREE, GREY, HIGHLY WEATHERED, MODERATELY STRONG ROCK.
43.08	3.24			100% DOLERITE	SCREE, GREY, SLIGHTLY WEATHERED, VERY STRONG ROCK.
43.80	0.72			100% DOLERITE	SCREE, GREY, HIGHLY WEATHERED.
45.19	1.39			100% DOLERITE	SCREE, GREY, SLIGHTLY WEATHERED, VERY STRONG ROCK.
46.80	1.61			100% DOLERITE	SCREE, GREY, MODERATELY WEATHERED, STRONG ROCK.
47.80	1.00			100% DOLERITE	SCREE, GREY, MODERATELY WEATHERED, STRONG ROCK.
48.72	0.92			100% DOLERITE	SCREE, GREY, HIGHLY WEATHERED, MODERATELY STRONG ROCK.
49.04	0.32			100% DOLERITE	SCREE, BROWN, COMPLETELY WEATHERED, VERY WEAK ROCK.
49.65	0.61			100% DOLERITE	SCREE, GREY, SLIGHTLY WEATHERED, VERY STRONG ROCK.
50.96	1.31			100% DOLERITE	SCREE, GREY, HIGHLY WEATHERED, MODERATELY STRONG ROCK.
52.41	1.45			100% DOLERITE	SCREE, GREY, SLIGHTLY WEATHERED, VERY STRONG ROCK.
53.35	0.94			100% DOLERITE	SCREE, GREY, HIGHLY WEATHERED, MODERATELY STRONG ROCK.
55.19	1.84			100% DOLERITE	SCREE, GREY, SLIGHTLY WEATHERED, VERY STRONG ROCK.
55.80	0.61			100% DOLERITE	SCREE, GREY, MODERATELY WEATHERED, STRONG ROCK.

DEPTH TO BASE M	THICKNESS M	REC X	SAMPLE NUMBER	ROCK TYPE	GEOLOGICAL DESCRIPTION *** CORE DESCRIPTION ***
58.39	2.59			100% DOLERITE	SCREE, GREY, HIGHLY WEATHERED, MODERATELY STRONG ROCK.
58.80	0.41			100% DOLERITE	SCREE, GREY, SLIGHTLY WEATHERED, VERY STRONG ROCK.
61.80	3.00			100% DOLERITE	SCREE, GREY, HIGHLY WEATHERED, MODERATELY STRONG ROCK.
63.51	1.71			100% DOLERITE	SCREE, GREY, HIGHLY WEATHERED, MODERATELY STRONG ROCK.
64.80	1.29			100% DOLERITE	SCREE, COMPLETELY WEATHERED.
67.65	2.85			100% DOLERITE	SCREE, GREY, HIGHLY WEATHERED, MODERATELY WEAK ROCK.
67.80	0.15			100% DOLERITE	SCREE, COMPLETELY WEATHERED.
70.65	2.85			100% DOLERITE	SCREE, GREY, HIGHLY WEATHERED, MODERATELY WEAK ROCK.
70.80	0.15			100% DOLERITE	SCREE, COMPLETELY WEATHERED.
76.80	6.00			100% DOLERITE	SCREE, GREY-BROWN, HIGHLY WEATHERED, MODERATELY WEAK ROCK.
79.30	2.50			100% DOLERITE	SCREE, GREY-BROWN, HIGHLY WEATHERED, MODERATELY WEAK ROCK.
79.60	0.30			100% DOLERITE	SCREE, COMPLETELY WEATHERED.
79.80	0.20			100% MUDSTONE	FRIABLE, BADLY BROKEN, GREY, VERY WEAK ROCK.
81.14	1.34			100% MUDSTONE	FRIABLE, GREY, VERY WEAK ROCK, CLOSELY SPACED JOINTS, JOINTS DIP 5 DEG.
82.87	1.73			70% SILTSTONE 30% SANDSTONE	GREY. VERY FINE GRAINED, LENSES, LIGHT GREY. MODERATELY STRONG ROCK, MODERATELY SPACED JOINTS, JOINTS DIP 5 DEG.
83.12	0.25			100% SANDSTONE, FINE GRAINED	LIGHT GREY, STRONG ROCK.
84.16	1.04			100% MUDSTONE	SILTSTONE, GREY, MODERATELY STRONG ROCK, CLOSELY SPACED JOINTS, JOINTS DIP 5 DEG.
85.80	1.64			60% SANDSTONE 40% MUDSTONE	VERY FINE GRAINED, LIGHT GREY. CARBONACEOUS, LAMINAE, GREY. STRONG ROCK, MODERATELY SPACED JOINTS, JOINTS DIP 5 DEG.
86.99	1.19			80% MUDSTONE 20% SILTSTONE	CARBONACEOUS, TRACES, GREY. LAMINAE, BROWN. STRONG ROCK, CLOSELY SPACED JOINTS, JOINTS DIP 5 DEG.
88.80	1.81			100% SANDSTONE, MEDIUM GRAINED	MASSIVE, LIGHT GREY, STRONG ROCK, WIDELY SPACED JOINTS, JOINTS DIP 5 DEG.
91.63	2.83			100% SANDSTONE, MEDIUM GRAINED	LIGHT GREY, STRONG ROCK, WIDELY SPACED JOINTS, JOINTS DIP 80 DEG.

DEPTH TO BASE M	THICKNESS M	REC X	SAMPLE NUMBER	ROCK TYPE	GEOLOGICAL DESCRIPTION
*** CORE DESCRIPTION ***					
TOP OF DALMAYNE B : 178.37 M R.L.					
91.68	0.05			100% COAL, DULL	
91.70	0.02			100% MUDSTONE	MICACEOUS, LIGHT BROWN.
91.80	0.10			100% COAL, DULL	
92.23	0.43			100% MUDSTONE	FRIABLE, MICACEOUS, LIGHT BROWN, VERY WEAK ROCK.
92.33	0.10			100% COAL, DULL	
92.40	0.07			100% MUDSTONE	FRIABLE, MICACEOUS, LIGHT BROWN.
92.86	0.46			90% COAL, DULL 10% MUDSTONE	LAMINAE, BROWN.
92.91	0.05			100% COAL, DULL WITH NUMEROUS BRIGHT BANDS	WITH CALCITE ON CLEAT.
92.99	0.08			100% COAL, DULL	
93.07	0.08			50% CARBONACEOUS SHALE 50% COAL	DARK BROWN. MID LUSTROUS-BRIGHT COAL, LAMINAE. WITH CALCITE ON CLEAT.
93.16	0.09			100% MUDSTONE	CARBONACEOUS, DARK GREY, MODERATELY STRONG ROCK.
93.68	0.52			100% MUDSTONE	SILTSTONE, GREY, MODERATELY STRONG ROCK.
93.92	0.24			100% MUDSTONE	BENTONITIC, FRIABLE, LIGHT BROWN, VERY WEAK ROCK, VERY STICKY.
94.10	0.18			100% CARBONACEOUS MUDSTONE	DARK GREY, MODERATELY WEAK ROCK.
94.79	0.69			100% MUDSTONE	CARBONACEOUS, TRACES, GREY, MODERATELY WEAK ROCK.
BASE OF DALMAYNE B : THICKNESS= 3.16 M; SAMPLED THICKNESS= 0.00 M					
97.10	2.31			100% SILTSTONE	GREY, MODERATELY STRONG ROCK, MODERATELY SPACED JOINTS, JOINTS DIP 5 DEG.
99.90	2.80			70% SANDSTONE, FINE GRAINED 30% CARBONACEOUS MUDSTONE	LIGHT GREY. STREAKS, DARK GREY. STRONG ROCK.
100.67	0.77			60% MUDSTONE 40% SANDSTONE	CARBONACEOUS, TRACES, DARK BROWN. VERY FINE GRAINED, LAMINAE, LIGHT GREY.
103.90	3.23			100% MUDSTONE	CARBONACEOUS, TRACES, GREY, MODERATELY STRONG ROCK, JOINTS DIP 80 DEG., WITH SLICKENSIDES.
110.86	6.96			95% SANDSTONE, MEDIUM GRAINED 5% COAL	MASSIVE, GREY. TRACES.
111.89	1.03			100% MUDSTONE	CARBONACEOUS, TRACES, GREY.

DEPTH TO BASE M	THICKNESS M	REC X	SAMPLE NUMBER	ROCK TYPE	GEOLOGICAL DESCRIPTION
*** CORE DESCRIPTION ***					
118.80	6.91			90% SANDSTONE, MEDIUM GRAINED 10% COAL	GREY. LENSES. STRONG ROCK.
121.27	2.47			100% SANDSTONE, MEDIUM GRAINED	GREY, VERY STRONG ROCK.
TOP OF DALMAYNE C : 148.73 M R.L.					
121.33	0.06			100% COAL, DULL	
122.01	0.68			100% MUDSTONE	CARBONACEOUS, TRACES, GREY-BROWN, JOINTS DIP 50 DEG., WITH SLICKENSIDES.
122.41	0.40			100% MUDSTONE	FRIABLE, MICACEOUS, LIGHT BROWN, VERY WEAK ROCK.
122.75	0.34			100% MUDSTONE	CARBONACEOUS, DARK GREY.
124.83	2.08			100% MUDSTONE	GREY, MODERATELY STRONG ROCK.
125.97	1.14			100% MUDSTONE	CARBONACEOUS, DARK GREY, MODERATELY STRONG ROCK.
126.13	0.16			100% CARBONACEOUS MUDSTONE	DARK BROWN, STRONG ROCK.
BASE OF DALMAYNE C : THICKNESS= 4.86 M; SAMPLED THICKNESS= 0.00 M					
126.82	0.69			100% MUDSTONE	CARBONACEOUS, TRACES, GREY.
127.80	0.98			80% SANDSTONE, FINE GRAINED 20% CARBONACEOUS MUDSTONE	GREY. FRAGMENTS, DARK BROWN. STRONG ROCK.
137.84	10.04			100% SANDSTONE, MEDIUM GRAINED	MASSIVE, GREY, VERY STRONG ROCK.
138.67	0.83			90% SANDSTONE, MEDIUM GRAINED 10% COAL	GREY. FRAGMENTS. VERY STRONG ROCK.
142.82	4.15			95% SANDSTONE 5% COAL	MED.-FINE GRAINED, GREY. STREAKS. VERY STRONG ROCK.
143.64	0.82			100% SANDSTONE, MEDIUM GRAINED	MASSIVE, GREY, VERY STRONG ROCK.
144.20	0.56			70% SANDSTONE, MEDIUM GRAINED 30% MUDSTONE	GREY. PELLETAL, GREY-BROWN.
144.41	0.21			80% MUDSTONE 20% SANDSTONE, MEDIUM GRAINED	GREY-BROWN. LENSES, GREY. MODERATELY STRONG ROCK.
144.55	0.14			100% MUDSTONE	FRIABLE, GREY-BROWN, WEAK ROCK.
147.30	2.75			90% SANDSTONE, MEDIUM GRAINED 10% MUDSTONE	GREY. PELLETAL, GREY-BROWN. STRONG ROCK.
147.54	0.24			100% SHALE	BROWN, EXTREMELY STRONG ROCK, WITH SAND LINEATION.

DEPTH TO BASE H	THICKNESS M	REC %	SAMPLE NUMBER	ROCK TYPE	GEOLOGICAL DESCRIPTION
*** CORE DESCRIPTION ***					
147.57	0.03			100X SANDSTONE, MEDIUM GRAINED	LENSES, GREY.
147.62	0.05			100X CARBONACEOUS MUDSTONE	DARK BROWN, WEAK ROCK.
147.76	0.14			100X SANDSTONE, MEDIUM GRAINED	GREY-BROWN, VERY STRONG ROCK.
147.84	0.08			100X SHALE	LENSES, BROWN, EXTREMELY STRONG ROCK, WITH SAND LINEATION.
147.93	0.09			100X MUDSTONE	CARBONACEOUS, TRACES, GREEN.
148.34	0.41			100X SANDSTONE, MEDIUM GRAINED	GREY, VERY STRONG ROCK.
148.37	0.03			100X MUDSTONE	CARBONACEOUS, TRACES, BROWN.
156.96	8.59			100X SANDSTONE, MEDIUM GRAINED	GREY, VERY STRONG ROCK.
157.11	0.15			60X SANDSTONE, MEDIUM GRAINED 40X CARBONACEOUS MUDSTONE	GREY. LENSES, DARK BROWN. STRONG ROCK.
159.53	2.42			100X SANDSTONE, MEDIUM GRAINED	GREY, STRONG ROCK.
159.69	0.16			70X SANDSTONE, MEDIUM GRAINED 30X MUDSTONE	GREY. GREY. STRONG ROCK.
160.09	0.40			100X MUDSTONE	GREY, WEAK ROCK, VERY STICKY.
160.80	0.71			100X SANDSTONE, MEDIUM GRAINED	GREY, MODERATELY STRONG ROCK.
162.98	2.18			100X SANDSTONE, MEDIUM GRAINED	GREY, STRONG ROCK.
163.49	0.51			80X SANDSTONE, MEDIUM GRAINED 20X COAL	GREY. LENSES. STRONG ROCK.
172.07	8.58			100X SANDSTONE, MEDIUM GRAINED	GREY, STRONG ROCK.
172.92	0.85			90X SANDSTONE, MEDIUM GRAINED 10X COAL	GREY. LENSES. STRONG ROCK.
175.77	2.85			100X SANDSTONE	MED.-COARSE GRAINED, GREY, STRONG ROCK.
179.64	3.87			100X SANDSTONE, MEDIUM GRAINED	GREY, MODERATELY STRONG ROCK.

TOP OF DALMAYNE D UPPER : 90.36 M R.L.					

179.74	0.10			100X COAL, DULL	
179.83	0.09			100X CARBONACEOUS MUDSTONE	DARK BROWN.
179.90	0.07			100X COAL, DULL	

BASE OF DALMAYNE D UPPER : THICKNESS= 0.26 M; SAMPLED THICKNESS= 0.00 M					

179.94	0.04			100X CARBONACEOUS SHALE	DARK BROWN, STRONG ROCK.

DEPTH TO BASE M	THICKNESS M	REC X	SAMPLE NUMBER	ROCK TYPE	GEOLOGICAL DESCRIPTION
*** CORE DESCRIPTION ***					
179.99	0.05			100% MUDSTONE	CARBONACEOUS, TRACES, GREY-BROWN.
180.67	0.68			100% SILTSTONE	GREY, MODERATELY STRONG ROCK.
181.25	0.58			70% SANDSTONE, MEDIUM GRAINED 30% MUDSTONE	GREY. LENSES, GREY. STRONG ROCK.
181.60	0.35			100% MUDSTONE	GREY-BROWN, MODERATELY WEAK ROCK.
190.80	9.20			100% SANDSTONE, MEDIUM GRAINED	MASSIVE, GREY, STRONG ROCK.
198.27	7.47			100% SANDSTONE, MEDIUM GRAINED	MASSIVE, GREY, MODERATELY STRONG ROCK.
198.76	0.49			100% SILTSTONE	GREY-BROWN, MODERATELY WEAK ROCK.
198.96	0.20			50% SANDSTONE, MEDIUM GRAINED 50% SILTSTONE	GREY. GREY-BROWN. MODERATELY WEAK ROCK.
199.79	0.83			100% SANDSTONE, MEDIUM GRAINED	GREY, STRONG ROCK.
212.27	12.48			100% SANDSTONE, MEDIUM GRAINED	MASSIVE, GREY, MODERATELY STRONG ROCK.
212.46	0.19			50% SANDSTONE 50% MUDSTONE	MED.-COARSE GRAINED, LIGHT GREY. LENSES, GREY. STRONG ROCK.
213.23	0.77			100% SANDSTONE, MEDIUM GRAINED	MASSIVE, GREY, STRONG ROCK.
TOP OF DALMAYNE D LOWER : 56.77 M R.L.					
213.32	0.09			100% COAL, DULL	
213.36	0.04			100% MUDSTONE	CARBONACEOUS, STREAKS, BROWN, MODERATELY WEAK ROCK.
213.39	0.03			100% SANDSTONE, MEDIUM GRAINED	COALY, DARK BROWN, STRONG ROCK.
213.45	0.06			50% COAL, DULL 50% COAL, BRIGHT	BANDS. WITH CALCITE ON CLEAT.
BASE OF DALMAYNE D LOWER : THICKNESS= 0.22 M; SAMPLED THICKNESS= 0.00 M					
214.38	0.93			100% MUDSTONE	CARBONACEOUS, FRAGMENTS, DARK GREY, MODERATELY WEAK ROCK.
214.42	0.04			100% CARBONACEOUS MUDSTONE	FRIABLE, DARK BROWN.
214.56	0.14			100% MUDSTONE	CARBONACEOUS, FRAGMENTS, GREY-BROWN.
214.68	0.12			100% CARBONACEOUS MUDSTONE	FRIABLE, DARK BROWN, VERY WEAK ROCK.
TOP OF DALMAYNE D LOWER : 55.32 M R.L.					
214.72	0.04		22/1	100% COAL, DULL	

DEPTH TO BASE M	THICKNESS M	REC X	SAMPLE NUMBER	ROCK TYPE	GEOLOGICAL DESCRIPTION *** CORE DESCRIPTION ***
214.74	0.02		22/1	100% MUDSTONE	GREY-GREEN, VERY WEAK ROCK, VERY STICKY.
214.75	0.01		22/1	100% CARBONACEOUS MUDSTONE	DARK BROWN, VERY WEAK ROCK.
214.88	0.13		22/1	100% COAL, DULL	
215.33	0.45		22/1	100% COAL, DULL WITH NUMEROUS BRIGHT BANDS	
215.36	0.03		22/1	100% MUDSTONE	COALY, TRACES, LIGHT BROWN, MODERATELY WEAK ROCK.
215.47	0.11		22/1	100% COAL, DULL	
BASE OF DALMAYNE D LOWER : THICKNESS= 0.79 M; SAMPLED THICKNESS= 0.79 M					
215.94	0.47			100% MUDSTONE	CARBONACEOUS, FRAGMENTS, GREY, MODERATELY WEAK ROCK.
216.03	0.09			100% CARBONACEOUS MUDSTONE	COALY, BANDS, DARK BROWN.
217.80	1.77			100% MUDSTONE	CARBONACEOUS, TRACES, GREY.
218.79	0.99			100% SILTSTONE	GREY, MODERATELY WEAK ROCK.
219.19	0.40			90% SANDSTONE, MEDIUM GRAINED 10% MUDSTONE	GREY. PELLETAL, DARK GREY.
219.61	0.42			50% SANDSTONE, MEDIUM GRAINED 50% MUDSTONE	GREY. LENSES, DARK GREY. MODERATELY STRONG ROCK.
223.80	4.19			100% SANDSTONE, MEDIUM GRAINED	MASSIVE, GREY, STRONG ROCK.
235.20	11.40			100% SANDSTONE, MEDIUM GRAINED	COALY, TRACES, GREY, STRONG ROCK.
235.29	0.09			50% MUDSTONE 50% SANDSTONE, FINE GRAINED	DARK GREY. GREY. LAMINATED.
235.48	0.19			100% COAL, DULL	
235.57	0.09			100% CARBONACEOUS MUDSTONE	DARK BROWN, WEAK ROCK.
235.65	0.08			100% MUDSTONE	CARBONACEOUS, DARK BROWN, WEAK ROCK.
235.76	0.11			100% MUDSTONE	CARBONACEOUS, FRAGMENTS, DARK GREY, MODERATELY WEAK ROCK.
236.37	0.61			100% MUDSTONE	CARBONACEOUS, TRACES, GREY, MODERATELY WEAK ROCK.
237.33	0.96			50% SILTSTONE 50% MUDSTONE	GREY-BROWN. GREY. MODERATELY STRONG ROCK, LAMINATED.
238.07	0.74			90% SILTSTONE 10% CARBONACEOUS MUDSTONE	GREY-BROWN. STREAKS, DARK GREY.
238.29	0.22			90% SANDSTONE 10% CARBONACEOUS MUDSTONE	VERY FINE GRAINED, GREY. STREAKS, DARK GREY.
238.80	0.51			100% SANDSTONE, FINE GRAINED	GREY, MODERATELY STRONG ROCK.

DEPTH TO BASE M	THICKNESS M	REC X	SAMPLE NUMBER	ROCK TYPE	GEOLOGICAL DESCRIPTION
					*** CORE DESCRIPTION ***
244.76	5.96			100X SANDSTONE, MEDIUM GRAINED	GREY, MODERATELY STRONG ROCK.
246.34	1.58			90% SANDSTONE, MEDIUM GRAINED 10% CARBONACEOUS MUDSTONE	GREY. STREAKS, DARK GREY. MODERATELY WEAK ROCK.
247.80	1.46			100X SANDSTONE, MEDIUM GRAINED	MASSIVE, GREY, MODERATELY WEAK ROCK.
250.33	2.53			50X MUDSTONE 50X SANDSTONE	SILTSTONE, DARK GREY. VERY FINE GRAINED, LAMINAE, GREY.
250.67	0.34			100X MUDSTONE	GREY-BROWN, MODERATELY WEAK ROCK.
250.70	0.03			100X COAL, DULL	
250.75	0.05			100X CARBONACEOUS MUDSTONE	DARK BROWN, WEAK ROCK.
250.87	0.12			100X COAL, DULL	
250.88	0.01			100X MUDSTONE	FRIABLE, MICACEOUS, LIGHT BROWN.
250.90	0.02			100X CARBONACEOUS SHALE	DARK BROWN, STRONG ROCK.
250.92	0.02			100X MUDSTONE	MICACEOUS, LIGHT BROWN.
250.95	0.03			100X CARBONACEOUS SHALE	DARK BROWN, STRONG ROCK.
250.99	0.04			100X MUDSTONE	CARBONACEOUS, DARK GREY.
251.04	0.05			100X SHALE	COALY, BLACK.
252.58	1.54			100X MUDSTONE	CARBONACEOUS, TRACES, GREY.
252.68	0.10			100X CARBONACEOUS MUDSTONE	DARK BROWN, VERY WEAK ROCK.
252.70	0.02			100X COAL, DULL	
252.71	0.01			100X MUDSTONE	MICACEOUS, LIGHT BROWN.
253.05	0.34			100X CARBONACEOUS MUDSTONE	DARK BROWN, VERY WEAK ROCK.
253.06	0.01			100X COAL, DULL	
253.10	0.04			100X MUDSTONE	CARBONACEOUS, TRACES, GREY, MODERATELY STRONG ROCK.
253.15	0.05			100X COAL, DULL	
253.17	0.02			100X MUDSTONE	MICACEOUS, LIGHT BROWN.
253.20	0.03			100X CARBONACEOUS MUDSTONE	DARK BROWN, VERY WEAK ROCK.
253.33	0.13			100X COAL, DULL	
253.36	0.03			100X MUDSTONE	GREY, MODERATELY WEAK ROCK.
253.61	0.25			100X COAL, DULL	
256.22	2.61			100X MUDSTONE	CARBONACEOUS, TRACES, GREY, MODERATELY WEAK ROCK.
256.24	0.02			100X MUDSTONE	FRIABLE, LIGHT BROWN.
256.39	0.15			100X COAL, DULL	

DEPTH TO BASE M	THICKNESS M	REC X	SAMPLE NUMBER	ROCK TYPE	GEOLOGICAL DESCRIPTION
					*** CORE DESCRIPTION ***
256.44	0.05			100X SHALE	COALY, DARK BROWN.
256.80	0.36			100X MUDSTONE	CARBONACEOUS, TRACES, GREY.
257.71	0.91			100X MUDSTONE	SILTSTONE, GREY.
257.72	0.01			100X MUDSTONE	MICACEOUS, FRIABLE, LIGHT BROWN.
257.78	0.06			100X CARBONACEOUS MUDSTONE	DARK BROWN, VERY WEAK ROCK.
258.42	0.64			100X MUDSTONE	SILTSTONE, LAMINAE, GREY.
259.25	0.83			50X MUDSTONE 50X SANDSTONE	DARK GREY. VERY FINE GRAINED, GREY.
262.11	2.86			100X MUDSTONE	SILTSTONE, GREY.
262.20	0.09			100X MUDSTONE	CARBONACEOUS, DARK GREY.
262.36	0.16			100X CARBONACEOUS MUDSTONE	DARK BROWN, WEAK ROCK.
262.56	0.20			100X COAL, DULL	
264.18	1.62			100X MUDSTONE	CARBONACEOUS, DARK GREY, MODERATELY WEAK ROCK.
264.29	0.11			100X CARBONACEOUS MUDSTONE	DARK BROWN, WEAK ROCK.
264.56	0.27			100X MUDSTONE	SILTSTONE, CARBONACEOUS, DARK GREY.
265.88	1.32			70X SANDSTONE, MEDIUM GRAINED 30X CARBONACEOUS MUDSTONE	GREY. LAMINAE, DARK BROWN.
265.97	0.09			90X SANDSTONE, MEDIUM GRAINED 10X CARBONACEOUS MUDSTONE	GREY. STREAKS, DARK BROWN. MODERATELY STRONG ROCK.
266.49	0.52			100X MUDSTONE	GREY, WEAK ROCK.
266.53	0.04			100X CARBONACEOUS MUDSTONE	FRIABLE, DARK BROWN, VERY WEAK ROCK.
266.59	0.06			100X COAL, DULL	
266.61	0.02			100X MUDSTONE	FRIABLE, LIGHT BROWN, VERY WEAK ROCK.
266.64	0.03			100X CARBONACEOUS MUDSTONE	DARK BROWN, WEAK ROCK.
267.49	0.85			100X MUDSTONE	CARBONACEOUS, FRAGMENT'S, GREY-BROWN, MODERATELY WEAK ROCK.
268.12	0.63			100X CARBONACEOUS MUDSTONE	DARK BROWN, MODERATELY WEAK ROCK.
268.17	0.05			100X CARBONACEOUS SHALE	DARK BROWN, MODERATELY STRONG ROCK.

TOP OF DALMAYNE E2 : 1.83 M R.L.					
268.35	0.18			100X COAL, DULL	
268.51	0.16			100X CARBONACEOUS SHALE	DARK BROWN, MODERATELY STRONG ROCK.

DEPTH TO BASE M	THICKNESS M	REC X	SAMPLE NUMBER	ROCK TYPE	GEOLOGICAL DESCRIPTION
*** CORE DESCRIPTION ***					
268.65	0.14			60% SANDSTONE, MEDIUM GRAINED 40% CARBONACEOUS SHALE	GREY. LAMINAE, DARK BROWN. STRONG ROCK.
268.87	0.22			100% COAL, DULL	
268.88	0.01			100% CARBONACEOUS MUDSTONE	DARK BROWN, WEAK ROCK.
268.93	0.05			100% COAL, DULL	
268.98	0.05			100% CARBONACEOUS MUDSTONE	DARK BROWN, WEAK ROCK.
269.05	0.07			100% COAL, DULL	
269.08	0.03			100% CARBONACEOUS MUDSTONE	DARK BROWN, WEAK ROCK.
269.19	0.11			100% COAL, DULL	
BASE OF DALMAYNE E2 : THICKNESS= 1.02 M; SAMPLED THICKNESS= 0.00 M					
270.26	1.07			70% CARBONACEOUS MUDSTONE 30% CARBONACEOUS SHALE	DARK BROWN. DARK BROWN.
271.77	1.51			100% MUDSTONE	GREY, WEAK ROCK.
276.04	4.27			100% MUDSTONE	GREY, MODERATELY WEAK ROCK.
276.82	0.78			100% CARBONACEOUS MUDSTONE	DARK BROWN, MODERATELY WEAK ROCK.
277.80	0.98			100% MUDSTONE	CARBONACEOUS, FRAGMENTS, GREY-BROWN.
278.25	0.45			100% MUDSTONE	CARBONACEOUS, DARK BROWN, MODERATELY STRONG ROCK.
278.68	0.43			100% CARBONACEOUS MUDSTONE	DARK BROWN, MODERATELY STRONG ROCK.
279.23	0.55			70% SANDSTONE, MEDIUM GRAINED 30% MUDSTONE	GREY. CARBONACEOUS, LAMINAE, DARK BROWN. MODERATELY STRONG ROCK.
286.06	6.83			100% SANDSTONE, MEDIUM GRAINED	MASSIVE, GREY, STRONG ROCK.
TOP OF DALMAYNE F : -16.06 M R.L.					
286.67	0.61			100% COAL, DULL	
286.77	0.10			100% CARBONACEOUS MUDSTONE	DARK BROWN, VERY WEAK ROCK.
286.87	0.10			100% CARBONACEOUS MUDSTONE	DARK BROWN, WEAK ROCK.
287.29	0.42			100% CARBONACEOUS SHALE	DARK BROWN, MODERATELY STRONG ROCK.
287.90	0.61			60% SANDSTONE, MEDIUM GRAINED 40% CARBONACEOUS SHALE	GREY. LAMINAE, DARK BROWN. MODERATELY STRONG ROCK.
288.15	0.25			100% CARBONACEOUS MUDSTONE	DARK BROWN, MODERATELY WEAK ROCK.
288.41	0.26			100% MUDSTONE	CARBONACEOUS, FRAGMENTS, GREY.

DEPTH TO BASE M	THICKNESS M	REC X	SAMPLE NUMBER	ROCK TYPE	GEOLOGICAL DESCRIPTION
288.50	0.09			100X CARBONACEOUS SHALE	DARK BROWN, MODERATELY STRONG ROCK.
288.69	0.19			100X COAL, DULL	
289.31	0.62			100X MUDSTONE	CARBONACEOUS, TRACES, GREY.
289.41	0.10			100X COAL, DULL	
BASE OF DALMAYNE F : THICKNESS= 3.35 M; SAMPLED THICKNESS= 0.00 M					
289.43	0.02			100X CARBONACEOUS MUDSTONE	DARK BROWN, MODERATELY WEAK ROCK.
290.55	1.12			100X MUDSTONE	CARBONACEOUS, TRACES, GREY, MODERATELY STRONG ROCK.
290.92	0.37			100X SANDSTONE, FINE GRAINED	GREY, STRONG ROCK.
293.21	2.29			100X MUDSTONE	CARBONACEOUS, TRACES, GREY, MODERATELY STRONG ROCK.
293.26	0.05			100X COAL, DULL	
293.43	0.17			100X CARBONACEOUS MUDSTONE	DARK BROWN, MODERATELY WEAK ROCK.
293.75	0.32			100X MUDSTONE	CARBONACEOUS, TRACES, GREY, MODERATELY WEAK ROCK.
293.80	0.05			50X CARBONACEOUS SHALE 50X COAL	DARK BROWN. MID LUSTROUS-BRIGHT COAL, BANDS. MODERATELY STRONG ROCK.
294.86	1.06			100X MUDSTONE	CARBONACEOUS, BANDS, GREY.
295.80	0.94			50X SANDSTONE 50X CARBONACEOUS MUDSTONE	VERY FINE GRAINED, GREY. LAMINAE, DARK BROWN.
295.87	0.07			50X SANDSTONE, FINE GRAINED 50X CARBONACEOUS MUDSTONE	GREY. COALY, FRAGMENTS.
296.53	0.66			50X SANDSTONE, FINE GRAINED 50X MUDSTONE	GREY. DARK GREY.
297.04	0.51			70X SANDSTONE, FINE GRAINED 30X MUDSTONE	GREY. DARK GREY.
297.30	0.26			100X MUDSTONE	GREY-BROWN.
297.77	0.47			80X SANDSTONE, FINE GRAINED 20X CARBONACEOUS MUDSTONE	GREY. DARK BROWN.
297.85	0.08			100X MUDSTONE	BAKED, LIGHT BROWN.
297.88	0.03			100X DOLERITE	MEDIUM GRAINED, GREY-GREEN, EXTREMELY STRONG ROCK.
297.92	0.04			100X MUDSTONE	BAKED, LIGHT BROWN, STRONG ROCK.
298.85	0.93			100X DOLERITE	MEDIUM GRAINED, GREY-GREEN, EXTREMELY STRONG ROCK.
298.86	0.01			100X MUDSTONE	BAKED, LIGHT BROWN, STRONG ROCK.
299.68	0.82			90X MUDSTONE 10X CARBONACEOUS MUDSTONE	BAKED, LIGHT BROWN. LENSES, BAKED, BLACK. STRONG ROCK.

DEPTH TO BASE M	THICKNESS M	REC %	SAMPLE NUMBER	ROCK TYPE	GEOLOGICAL DESCRIPTION
*** CORE DESCRIPTION ***					
303.08	3.40			100% DOLERITE	MEDIUM GRAINED, GREY, EXTREMELY STRONG ROCK.
303.39	0.31			100% MUDSTONE	BAKED, LIGHT BROWN, STRONG ROCK.
304.02	0.63			100% SANDSTONE	SILTSTONE, BAKED, GREY.
304.93	0.91			100% MUDSTONE	GREY.
305.31	0.38			100% SANDSTONE, COARSE GRAINED	PEBBLY, GREY, WITH PEBBLY QUARTZ.
305.32	0.01			100% MUDSTONE	GREY.
306.46	1.14			100% SANDSTONE, COARSE GRAINED	PEBBLY, GREY, WITH PEBBLY QUARTZ.
306.92	0.46			70% MUDSTONE 30% SANDSTONE, FINE GRAINED	GREY. LIGHT GREY.
307.83	0.91			50% SANDSTONE 50% MUDSTONE	QUARTZOSE, LIGHT GREY. GREY. LAMINATED.
308.39	0.56			100% SANDSTONE, MEDIUM GRAINED	QUARTZOSE, LIGHT GREY.
308.85	0.46			70% SANDSTONE, MEDIUM GRAINED 30% MUDSTONE	QUARTZOSE, LIGHT GREY. CARBONACEOUS, TRACES, DARK GREY.
310.81	1.96			100% SANDSTONE, FINE GRAINED	QUARTZOSE, LIGHT GREY.
312.13	1.32			100% SILTSTONE	FRIABLE, GREY-GREEN.
312.78	0.65			90% SANDSTONE, FINE GRAINED 10% SILTSTONE	QUARTZOSE, LIGHT GREY. LAMINAE, GREY.
317.11	4.33			100% SANDSTONE, FINE GRAINED	QUARTZOSE, LIGHT GREY.
317.67	0.56			100% SILTSTONE	CARBONACEOUS, TRACES, GREY.
318.26	0.59			100% SANDSTONE, MEDIUM GRAINED	QUARTZOSE, LIGHT GREY, EXTREMELY STRONG ROCK.
318.53	0.27			100% MUDSTONE	GREY, WITH PEBBLY QUARTZ.
318.60	0.07			70% MUDSTONE 30% QUARTZITE	GREY. STREAKS.
319.80	1.20			100% MUDSTONE	GREY, WITH PEBBLY QUARTZ.