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1979/27. A diamond drill hole at Palmers Road, Oyster Cove

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Abstract

A fully cored hole at Palmers Road [EN18112815] proved 42.26 m of Hickman Formation* beds resting on approximately 9 m of Bundella Mudstone.

INTRODUCTION

Boreholes at Harts Hill (near Margate) proved a new formation, the Hickman Formation*. This formation is known to be absent in the Cygnet area and must disappear fairly rapidly not too far to the west of Oyster Cove. This borehole was therefore sited at Palmers Road [EN18112815] in order to prove the presence or absence of the formation, and if present its extent, thickness, lithology and fossil content. The beds proved 42.26 m of fossiliferous mudstones, siltstones and granule conglomerates of the Hickman Formation. Dropstones are numerous throughout, and much of the sequence contains large amounts of comminuted shell debris probably indicative of a high energy inshore environment.

The presence of *Cancrinella* serves as a means of correlation with the Harts Hill area where *Cancrinella* was also recovered from the Hickman Formation (Farmer, 1979).

So far as can be seen the Hickman Formation rests conformably on the underlying Bundella Mudstone without any evidence of a break.

REFERENCE

FARMER, N. 1979. Two diamond drill holes at Harts Hill, near Margate. *Unpubl.Rep.Dep.Mines Tasm.* 1979/25.

[20 July 1979]

* Unpublished formation name.

GEOLOGICAL LOG OF OYSTER COVE NO. 1 (PALMERS ROAD) DIAMOND DRILL HOLE

Depth (m)	Description	Formation
0.00 - 2.36	Siltstone, grey, fossiliferous, bioturbate in places. Fossils include - <i>Fletcherithyris</i> , bryozoa, spiriferids, <i>Peruvispira</i> , <i>Etheripecten</i> .	↑ HICKMAN FORMATION ↓
2.36 - 3.18	Siltstone, dark grey to black, muddy. Some small dropped pebbles - <i>Cancrinella</i> .	
3.18 - 11.80	Sandy siltstone, light grey, bioturbate, fossiliferous throughout (<i>Cancrinella</i> at 4.10 m). Spiriferids, <i>Etheripecten</i> , <i>Wyndhamia dalwoodensis</i> , <i>Megadesmus</i> , neospiriferid fragments. Small gasteropods. Dropped pebbles. Carbonaceous plant fragments at 10.80 m.	
11.80 - 15.03	Siltstone, dark grey sparsely fossiliferous with some sandier beds. Some dropstones.	
15.03 - 15.93	Sandy siltstone, heavily bioturbate, with much comminuted shell debris. Small dropstones.	
15.93 - 20.60	Siltstone, dark grey, unfossiliferous apart from small patches of comminuted shell debris. (Similar in lithology to beds between 11.80 m and 15.03 m).	
20.60 - 21.96	Siltstone, strongly bioturbate, and granule - conglomerate. Some small dropstones.	
21.96 - 26.94	Sandy siltstone and siltstone, dark grey - with hydroplastic structures throughout.	↑ BUNDELLA MUDSTONE ↓
26.94 - 35.85	Siltstones and granule-conglomerates. Bioturbate. Spiriferid at 27.80 m. Spiriferid fragments. Some small dropstones.	
35.85 - 42.26	Granule-conglomerates with subordinate irregularly laminated and hydroplastic siltstones. Comminuted shell debris throughout - dropped pebbles. Micaceous. Pyrite segregations.	
42.26 - 51.20	Dark siltstone. Grey, fossiliferous. Bioturbate in places. Comminuted and other shell fragments throughout. Bryozoa - mainly stenoporids. <i>Eurydesma</i> . Spiriferids. <i>Martiniopsids</i> , <i>Deltopecten</i> .	
Hole terminated at 51.20 m.		