REPTADEONELLA FISSA (HINCKS) (Fig. 11E,F)

 $Microporella\ fissa\ Hincks, 1880b: 381, pl. 17, fig. 4.$   $Adeona\ porosa\ Canu\ \&\ Bassler, 1929: 376, pl. 50, fig. 7$ 

Adeona joloensis Bassler, 1936: 161 (nom. nov. pro Adeona porosa Canu & Bassler, 1929).

Reptadeonella joloensis: Harmer, 1957: 816, pl. 54, figs 1–3, text-fig. 86A–C; Ryland, 1974: 343; d'Hondt, 1986: 735; Winston, 1986: 24.

## Description

Colony encrusting, forming unilaminar sheets that are often extensive. Autozooids irregularly polygonal or oval, convex, distinct, separated by shallow grooves, becoming less pronounced in later ontogeny  $(0.6-0.7 \times 0.35-0.4 \text{ mm})$ . Frontal shield finely granular but with some pronounced tuberculations; a single series (sometimes 2) of large, closely spaced, marginal pores becoming less distinct with ontogeny; a single round spiramen in depression at centre of zooid. Primary orifice semicircular, as is the secondary orifice, which surmounts a short peristome. A suboral avicularium always present, short, triangular, set medially on the sloping proximal side, directed distolaterally; no crossbar. Additional avicularia, similar in size and shape to the suboral avicularium, are often produced later in ontogeny, generally at the proximal end of the autozooid; variably orientated. Some autozooids bear an extremely large, sickle-shaped adventitious avicularium in place of the suboral avicularium, originating lateral to the midline between the spiramen and peristome, looping out distolaterally around the orifice, expanded proximally, narrowing distally; no crossbar. Gonozooids with a crescent-shaped orifice.

## Remarks

The presence of the extremely large adventitious avicularium, figured by Hincks (1880b) which all but covers the frontal shield of the autozooid which bears it, is the most distinctive character of *Reptadeonella fissa*.

Microporella fissa was originally described by Hincks (1880b) from Indian Ocean specimens. His comprehensive description and clear illustration has seemingly been overlooked ever since. Adeona joloensis Bassler, 1936 (nom. nov. pro Adeona porosa Canu & Bassler, 1929) from the Philippines, has been the name

applied to all subsequent records of this species. Comparison of Hincks' type material (NHM 1899.5.1.1217, 1897.5.1.668, both Indian Ocean), Canu & Bassler's holotype (USNM 8170, Philippines), cotype (NHM 1931.12.30.140, Philippines) of Adeona porosa, and other material in the Natural History Museum, London with the material from Vanuatu shows that this is all one species, although there are certain minor differences among the specimens. In the series of type specimens, several adventitious avicularia may be present on the frontal shield in addition to the usual avicularium proximal to the orifice, between the orifice and the ascopore. The position, size, and orientation of the large sickle-shaped adventitious avicularia also differ within the material. In the type specimen they are large and robust and extend the zooid laterally and distally to the orifice without affecting the shape of the orifice itself. However, in material from Funafuti (NHM 1903.1.29.51-54) these avicularia are smaller, more gracile and more intimately connected to the orifice. This is also the case in the type of Adeona porosa Canu & Bassler, 1929. Other material from the Philippines is intermediate in size to those described above, with the avicularia modifying the shape of its peristome.

## Distribution

This unmistakable species has been noted from the Indian Ocean (Hincks, 1880b), Philippines (Canu & Bassler, 1929), and Great Barrier Reef (Ryland, 1974), and was found encrusting both large and small pieces of coral rubble from Poanangisu and Port Vila Harbour, Efate. Whilst Harmer's (1957) illustrations of material from the Loyalty Islands appear to match the species described above, his records from Singapore, China Sea and Malaysia must be reconsidered following examination of original specimens.



