

***Nellia simplex* Busk
(Fig. 4E,F)**

Salicornaria marginata Busk, 1852a: 367.

Nellia simplex Busk, 1852b: 19, pl. 65, fig 1; pl. 65
(bis), fig. 3.

Acanthodesia simplex (Busk) Harmer, 1926: 220,
pl.13, fig. 23.

MATERIAL EXAMINED
Stns. 25b, 28.

DESCRIPTION

Colony a dense, bushy tuft, 55mm high, branching dichotomously at intervals of 1-4mm; attached by a thick bundle of tubular rhizoids. Branches square-sectioned, 0.3mm wide, consisting of four longitudinal autozoid series, in two back-to-back pairs. Joints flexible; dichotomies continuously calcified when first formed, but fracturing across base of each new ramus, the joints then formed from thick chitinous tubes. Autozooids oblong, 0.5-0.65 x 0.3mm; frontal surface largely membranous, bounded by narrow, smoothly calcified rim of lateral wall, and with a small, triangular area of gymnocystal calcification on each proximo-lateral corner. Cryptocyst smooth, imperforate, concave, underlying about one-third total length of frontal membrane; a similar-sized shelf of interior calcification occupies the distal third of the autozoid cavity, but at a lower, i.e., more basal, level than the cryptocyst. Latero-basal walls meet in a pronounced suture along the midline of the autozoid. Large, multiporous septula present on lateral walls. Ovicell distinctive, wider than long, smoothly calcified and imperforate; protruding into the cavity of the distally succeeding autozoid, the vertical, lateral walls of which enclose the ovicell on each side, and extend as narrow tongues across the distal edge of the ovicell, fusing and defining the opesia of the distal autozoid. Avicularia absent. Small, triangular foramina in one or both of the proximo-lateral corners of some autozooids mark the origins of the long, tubular rhizoids, which grow basally, closely applied to the surfaces of the branches, and gather to form the rooting bundle.

REMARKS

A single, large, profusely branched colony was collected from Stn. 25b, and several small colonies from Stn. 28. *Nellia simplex* was described from the Torres Straits by Busk (1852b) and listed by Kirkpatrick (1890b) in his report on the Torres Straits collections made by A.C. Haddon in 1888-1889. Harmer (1926) founded his account on the fragmentary specimens described by these two authors, and the species does not seem to have been described subsequently.

