Techniques needed and plant shape

Classification

Division: Phaeophyta; Family: Dictyotaceae; Tribe: Dictyoteae

*Descriptive name

brown forked tips

Features

1. plants are olive-brown, 20-90mm long
2. branching is mainly forked (dichotomous) but there are also some unpaired side branches
3. branches are 1-2mm broad, and form linear sections between forks

Special requirements

1. view the blades microscopically to find
   • single, lens-shaped apical cells that may or may not protrude
   • if possible, tetrasporangia, scattered over the blade surface
2. slice a blade across and view microscopically:
   • the central part of the blade with a single row of large cells (medulla, med), and outer layer of small cells (cortex, co)
   • the blade edge with 2-3 rows of large medulla cells characteristic of the genus Dilophus

Occurrences

an infrequent species, from Pearson I., S Australia to Point Roadknight, Vic.

Usual Habitat

on rock, in shallow water or intertidal rock pools

Similar Species

1. Dictyota alternifida, but fronds are narrower (1-2mm broad), sporangia are clustered and side tufts develop in that species
2. Phillips (1992) included Dilophus angustus in Dilophus fastigiatus

Description in the Benthic Flora

Part II, pages 201, 202, 203

Details of Anatomy

1. a cross section stained blue (A18753 slide 9523) showing
   • the central part of the blade with a single row of large cells (medulla, med) and outer layer of small cells (cortex, co)
   • the blade edge with 2-3 rows of large medulla cells (arrowed), characteristic of the genus Dilophus
2. scattered tetrasporangia (t sp) viewed from the surface (A24519 slide 9526)
3. protruding, lens-shaped apical cell (ap c) from which all other cells are derived (A19885 slide 9524)

Dilophus angustus J Agardh
(now considered a synonym of Dictyota fastigiata Sonder from W Australia)

* Descriptive names are inventions to aid identification, and are not commonly used

“Algae Revealed” R N Baldock, S Australian State Herbarium, July 2003
Dilophus angustus J Agardh
(A69615)

* Descriptive names are inventions to aid identification, and are not commonly used

“Algae Revealed” R N Baldock, S Australian State Herbarium, July 2003