
Table of Contents

Chapter 1 Introduction.....	1
<i>Juliet Brodie and Jane Lewis</i>	
Chapter 2 Algae in the warp and weave of life: bound by plastids	7
<i>Charles F. Delwiche</i>	
Chapter 3 Evolution and relationships of algae: major branches of the tree of life	21
<i>Thomas Cavalier-Smith</i>	
Chapter 4 Classification and diatom systematics: the past, the present, and the future.....	57
<i>David M. Williams</i>	
Chapter 5 The taxonomy of cyanobacteria: molecular insights into a difficult problem.....	93
<i>Paul K. Hayes, Nermin Adel El Semary and Patricia Sánchez-Baracaldo</i>	
Chapter 6 Molecular systematics of red algae: building future structures on firm foundations	103
<i>Christine A. Maggs, Heroen Verbruggen and Olivier de Clerck</i>	
Chapter 7 Systematics of the green algae: conflict of classic and modern approaches.....	123
<i>Thomas Pröschold and Frederik Leliaert</i>	
Chapter 8 In the shadow of giants: systematics of the charophyte green algae.....	155
<i>John D. Hall and Charles F. Delwiche</i>	
Chapter 9 The chlorarachniophytes: evolution and classification.....	171
<i>Ken-ichiro Ishida, Akinori Yabuki and Shuhei Ota</i>	
Chapter 10 Molecular systematics of Haptophyta.....	183
<i>Bente Edvardsen and Linda K. Medlin</i>	

Chapter 11 Decrypting cryptomonads: a challenge for molecular taxonomy	197
<i>Federica Cerino and Adriana Zingone</i>	
Chapter 12 On dinoflagellate phylogeny and classification	215
<i>Øjvind Moestrup and Niels Daugbjerg</i>	
Chapter 13 Molecular genetics and the neglected art of diatomics	231
<i>David G. Mann and Katharine M. Evans</i>	
Chapter 14 Classification of the Phaeophyceae from past to present and current challenges	267
<i>Bruno de Reviers, Florence Rousseau, and Stefano G.A. Draisma</i>	
Chapter 15 Molecular systematics of the Chrysophyceae and Synurophyceae.....	285
<i>Robert A. Andersen</i>	
Chapter 16 A decade of euglenoid molecular phylogenetics.....	315
<i>Richard E. Triemer and Mark A. Farmer</i>	
Chapter 17 The contribution of genomics to the understanding of algal evolution.....	331
<i>Chris Bowler and Andrew E. Allen</i>	
Chapter 18 Algal molecular systematics: a review of the past and prospects for the future	341
<i>Linda K. Medlin, Katja Metfies, Uwe John and Jeanine L. Olsen</i>	
Glossary	355
Index	365
Publications Listing	377