

The PHYCOLOGIST

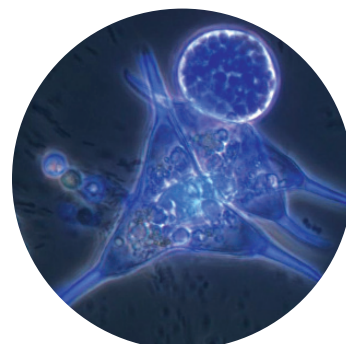
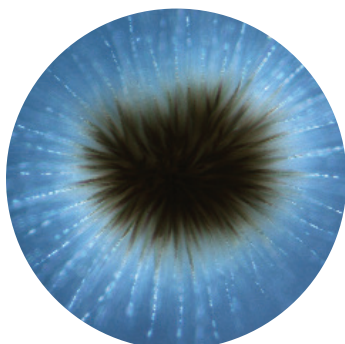
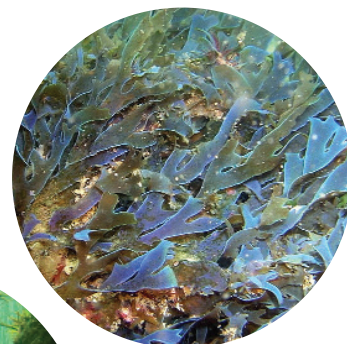


The Newsletter of the British Phycological Society

Editor: Dr Jan Krokowski

Homepage: <http://www.brphycsoc.org/>

Number 79
Autumn 2010



2010 British Psychological Society

Council Officers (January to January)

President

Professor Juliet Brodie (2009-2010)

President Elect

Professor Paul Hayes (2009-2010)

Immediate Past President

Professor Geoffrey Codd (2009-2010)

Vice President Overseas

Professor Patrizia Albertano (2009-2011)

*Secretary*¹

Dr Jane Pottas (2009-2012)

*Treasurer*²

Dr Michelle Tobin (2004-2012)

*Membership Secretary*³

Dr Sara Marsham (2007-2010)

*Editor of The Psychologist*⁴

Dr Jan Krokowski (2006-2012)

*Webmaster*⁵

Professor Mike D. Guiry

Editors of the European Journal of Psychology

Dr Eileen Cox (2004-)/Dr John Day (2007-)

Ordinary Members of Council (3-year term of office)

Prof David Mann (2007-2010)

Dr Rupert Perkins (2008-2011)

Prof Martin Wilkinson (2009-2012)

Dr Christine Maggs (2009-2012)

Dr Martha Clokie (2007-2010)

Dr Martyn Kelly (2008-2011)

Dr James Metcalfe (2009-2012)

Dr Thomas Proeschold (2007-2010)

Dr Agnes Mortensen⁶ (Student Rep. 2009-2011)

Dr Marian Yallop (2009-2012)

Addresses

1. Dr Jane Pottas

Centre for Marine and
Environmental Sciences
Scarborough Campus, University of Hull
Filey Road, Scarborough
North Yorkshire, YO11 3AZ, UK
j.pottas@hull.ac.uk
Tel: +44 (0)1723 357362

3. Dr Sara Marsham

Dove Marine Laboratory
School of Marine Science and Technology
Newcastle University
Cullercoats, North Shields
Tyne and Wear NE30 4PZ
s.marsham@ncl.ac.uk
Tel: +44 (0)1912 223056

5. Professor Mike D. Guiry

Martin Ryan Institute
National University of Ireland
Galway
Ireland
michael.guiry@nuigalway.ie
Tel: +353 91 492339

2. Dr Michelle Tobin

Centre for Marine and
Environmental Sciences
Scarborough Campus, University of Hull
Filey Road, Scarborough,
North Yorkshire, YO11 3AZ, UK
m.l.tobin@hull.ac.uk
Tel: +44 (0)1723 357290

4. Dr Jan Krokowski

Scottish Environment
Protection Agency (SEPA)
Redwood Crescent, Peel Park
East Kilbride G74 5PP
jan.krokowski@sepa.org.uk
Tel: +44 (0)1355 574200

6. Ms Agnes Mols Mortensen

University of New Hampshire
Biological Sciences
G32, Spaulding Life Science Center
38 College Road
Durham, NH03824, USA
agnes.mols@unh.edu
Tel: +1 603 969 2652



Editorial

Well here it is...the next edition of *The Phycologist* and the last one for 2010.

Please note the call for nominations for 3 Council members. Council membership is open to all BPS members and if you have someone in mind, or wish to nominate yourself...please read on. Council meetings are always lively (and the tea/coffee and biscuits are very good!) - it will be great to see new, young, fresh faces! It is important to engage the young generation

and nurture young talent (as mentioned in the 2007 autumn issue, no.73) to raise the profile of biology and phycology, and the article from the Chief Executive of the Society of Biology addresses this. It is never too young to get the 'wee bairns' interested in algae (see photo on cover).

This edition we also details the minutes from our last annual general meeting, and we have a membership update - so please take time to read this. The autumn edition also includes announcements and reviews, including the student bursary award reviews and the review from the winner of the Young Investigator Award, Gayle Harris. We also have an announcement for the 2010 Hilda Canter-Lund Photography Award. The spring 2010 edition of *The Phycologist* (issue no.78) detailed the winner (a southern right whale mother with her calf swimming through a green tide (tentatively composed of *Lepidodinium* sp.) taken by Mariano Sironi, and the front cover details the 2009 shortlisted finalist images: Colony of diatoms from genus *Licmophora* attached to red alga (photo: Chris Reiken); a common species of alga growing in the rocky bottom of the Gulf of California is *Dictyota flabellate* (photo: Gustavo Hernandez-Carmona); a live sample of *Gloeotrichia echinulata* (photo: Karl Bruun); an underwater cave in Brittany (France) close to Roscoff (photo Galice Hoarau); and fungal parasitism of the desmid *Staurodesmus* sp. in Lake Pavin (Massif Central, France) (photo: Serena Rasconi). Can you do better? If so read on how to enter. Deadline is 31 October 2010.

And to get us ready for Halloween....read on about the rediscovery of William Henry Harvey's grave.

Hope to see as many as possible in Cardiff for our 59th Winter Meeting. Do remember that it will be your (only?) opportunity to bid for the original fluffy, cuddly algae (courtesy of Giantmicrobes.com UK).

Remember - do keep sending in your contributions. Write to us with your phycological views, news, work events, or any matter you wish to share with readers of *The Phycologist*. YOUR input is required; all relevant material will be considered (job adverts, science reports, book reviews, news items of topical interest, meeting announcements, research news, and suggestions for future articles are always welcome). Without YOU the newsletter would not exist.

As a reminder, previous issues of *The Phycologist* can be downloaded at <http://www.brphycsoc.org/phycologist.lasso>.

Contents

The Phycologist - no. 79 Autumn 2010

| | |
|---|-------|
| Editorial | p. 3 |
| 58 th AGM review | p. 6 |
| Review of Bursaries and Grants | p. 10 |
| William Henry Harvey's Grave Rediscovered | p. 14 |
| Stoneworts at Yardley Chase, Northamptonshire | p. 16 |
| 2010 Hilda Canter-Lund Photography Award | p. 17 |
| 59 th Winter Meeting Circular | p. 18 |
| Instructions for Contributors | p. 24 |

Call for nominations for Council members

The terms of office of three Ordinary Members of Council come to an end in January 2011. Council membership is open to all members of the Society and nominations are invited from members who are willing to serve the BPS for a period of three years. Council membership involves attending three Council meetings each year - one in the summer and two which are held at the Winter Meeting before and after the Annual General Meeting. Council meetings always generate lively discussion and Council membership is a great way to find out how the Society is run and is also an opportunity to influence many aspects of the BPS from the Constitution to the organisation of the Winter Meeting. There may also be the opportunity to join one of the committees if you are interested in

serving in a specific area, e.g. Student Awards and Training Committee, Biodiversity and Conservation Committee, Education and Outreach Committee.

If you would like to nominate someone please ask them before forwarding their name along with a brief outline of their psychological interests/ research area to me (j.pottas@hull.ac.uk). Members may of course nominate themselves. You should also ask someone to second each nomination. If more than three nominations are received a vote will take place at the next Annual General Meeting to be held at the 2011 Winter Meeting in Cardiff (5th - 8th January 2011).

Jane Pottas BPS Secretary

Membership update

Dear BPS Members

There has been quite a lot of membership-related activity over the last few months so I thought it was about time for a membership update. The proposed changes to the student membership fees were ratified at the Annual General Meeting in Oban in January 2010 so I would like to thank members of the Society for their support. The changes include increasing the student membership subscription fee for annual membership without the journal to £10.00 (an increase in £5.00 per year) and also adding the option for students to apply for three years membership without the journal for a total fee £20.00. These changes will be effective from January 2011 with the membership forms being amended accordingly.

There has been discussion amongst some members and the Council regarding a membership directory for members to search and browse if they have a query or would like to make contact with another member. We feel that this would be a useful resource for members to get in touch with each other and so all members' contact details will be available in the membership directory which will be accessible via the website (www.brphycsoc.org). Obviously we realise that not all members would like their details to be included and so an 'Opt Out' button will be available on both the electronic and hard copies of the membership forms for members to chose whether they want to be included in the directory.

We have made some progress towards setting up PayPal as a payment option and we hope this will be ready in time for 2011 applications and renewals. I will keep you updated via e-mail and the website regarding when this will be online.

Finally there are still many contact details in the database that are incorrect - this causes us to receive postal returns from both *The Psychologist* and the *European Journal of Psychology* and also from e-mail announcements. Can I please ask all members to check their contact details and ensure they are up-to-date - this can be easily done by logging into your membership record in the database (<http://www.brphycsoc.org/membership/>).

If anyone has any questions or queries relating to their membership please do not hesitate to contact me using the contact details below.

Sara

BPS Membership Secretary

Dr. Sara Marsham
Dove Marine Laboratory
School of Marine Science and Technology
Newcastle University
Cullercoats
North Shields
Tyne and Wear
NE30 4PZ
Tel: +44 (0)191 2223056
e-mail: sara.marsham@ncl.ac.uk



Science funding - the need for common purpose

Whatever flavour of new Government emerges from the general election one thing is certain: they will not be over endowed with scientific expertise. Partly as a fall out from the expenses scandal, the number of parliamentarians standing down at this election is significant. The result, however the electorate votes, will mean at least 300 new MPs. Only a handful has any background in science. The scientific community will need to support these members and nurture an empathy with others to ensure the importance of science to our economy, health, the environment and social infrastructure is not lost.

They will need to be engaged in the issues rather than lectured to and above all, we need to avoid the trap of special pleading. The new Government, and back-benchers alike, need to hear a simple and consistent message about the value of science. The science budget must continue to be ring fenced and the amount within it at least maintained. If we can win the wider argument, biology has a strong heritage to call on to ensure the life sciences are not undervalued.

The Society is taking every opportunity to lobby. We have written to each parliamentary candidate to raise the profile of biology and the role of the Society but with a clear focus on the bigger picture. We are highlighting three key messages:

- 1. Recognition of the central role of science in the economy,** by maintaining or increasing funding for basic and applied research in real terms. We are calling on the new Government to develop a new 10-year funding framework for science, to underpin the UK's position as a world-leading scientific nation.
- 2. The importance of practical as well as theoretical skills in the training of scientists.** This will require financial support for a significant hands-on practical skills element, including lab and field skills in courses at school and university. School teachers should be enabled and supported to provide high quality laboratory and outdoor practical science teaching at all levels. We argue that particular attention is paid to this in forthcoming curriculum reviews.

- 3. The need to intensify efforts to ensure that scientific evidence is well used and communicated across government.** This is necessary to improve policy development and delivery where issues cross traditional departmental responsibilities. We recommend inclusion of principles guaranteeing academic freedom of scientific advisers in the ministerial code.

There are further, more detailed arguments to make about equality of funding between the sciences, pointing out the absolute necessity of ensuring UK biology is funded in a way that enables us to retain our world-leading position. But it would be a mistake to lead the debate with special pleading for the biosciences. We need new parliamentarians to more fully understand the wide value of public financial support for UK science as a whole.

The recent Question Time style debate organised by the Royal Society of Chemistry in partnership with the Society and others, between the science spokesmen for the three main parties - Adam Afriyie (Cons), Lord Drayson (Lab) and Evan Harris (Lib Dem) - did highlight some policy differences. And it is right to provide them with more of the detail, focussing on biology. But, they at least have a good overview of the issues. It will be the lack of science understanding across key ministerial posts and parliamentary committees that is likely to lead to misunderstanding or lack of urgency.

The Society will be working hard to build relationships with MPs and Peers post election, pushing them on their science policy and seeking to represent biology on behalf of our membership. We will develop a range of case studies on the impact of biology to support the detailed arguments and we welcome your input. But the more MPs hear the same message the more likely it is that we will succeed. We encourage you to write to your local MP with these messages and stand ready to offer support wherever possible.

Mark Downs
Chief Executive
Society of Biology

Minutes of the 58th Annual Meeting of the British Psychological Society, SAMS, Oban, Friday 8th January 2010, 5.30pm

Present: Patrizia Albertano, Christina Bock, Paul Brazier, Melanie Broadhurst, Martha Clokie, Geoffrey Codd, Eileen Cox, John Day, Matt Dring, Jane Jamieson, David Jewson, Martyn Kelly, Frithjof Küpper, Stephen Maberly, James Macgregor, David Mann, Sara Marsham, James Metcalf, Udo Nitschke, Jane Pottas, John Raven, Poonam Sharma, Elliot Shubert, Steve Slocombe, Michelle Tobin, Jo Wilbraham, Martin Wilkinson

In the absence of Juliet Brodie (President) Geoffrey Codd (GAC) as Immediate Past President took the chair.

1. Apologies

Juliet Brodie, (President), Mike Guiry, Paul Hayes (President Elect), Jan Krokowski, Agnes Mols Mortensen, Rupert Perkins

2. Minutes of the Winter Council and 57th AGM, January 2009

The minutes were approved: proposed by Elliot Shubert and seconded by Eileen Cox.

3. Matters arising

None.

4. Reports from Officers

a) Secretary

Jane Pottas opened by thanking John Day and Christine Campbell for organising the Winter Meeting at SAMS. Although the meeting had drawn 103 delegates, the bad weather in the south west of England prevented several, including the President and the President Elect, from travelling to Oban. She said that she had carried out her normal secretarial duties over the previous year and there was nothing out of the ordinary to report.

b) Treasurer

Michelle Tobin reported that the Society's financial situation remains good with income in 2009 notably higher than in 2008. The Society had received an advance of £30,000 from Taylor and Francis for Volume 44 (2009) of the *European Journal of Psychology* with any additional income to be paid in early 2010. Grants and studentships have increased mainly due to an increase in student applications. The Hilda Canter-Lund Prize was awarded for the first time. Available funds are in the region of £10,000 with unrestricted reserves currently standing at around £111,000. The use of these monies will be discussed at Council to see how they can be used most effectively to support the Society and its members. Michelle pointed out

that the BPS needs a reserve policy document as it is a requirement of the Charities Commission. Michelle thanked all Council members for their assistance, in particular Sara Marsham for Membership issues; GAC, Rupert Perkins and Gill Malin for the Student Awards & Training Committee work and other members for support and guidance.

GAC thanked Michelle for her work as Treasurer. The report was accepted: proposed by Eileen Cox and seconded by Martin Wilkinson.

c) Membership Secretary

Sara Marsham reported that the on-line database continues to work well, with very few problems encountered by the membership. A renewal notice for 2010 has yet to be circulated due to complications with PayPal. Notices will be sent out in January via BPS-L and Algae-L and also by post for those members who have not provided an e-mail address. The current active membership of the Society is 460 (351 fully paid up, 92 paid to end of 2008, 5 complimentary members and 12 Honorary Life Members), which is up by 37 fully paid-up members from the end of 2008. Twenty three fewer members were in arrears than at the end of 2008. Recruitment remains stable with 58 new members joining the Society in 2009, compared to 60 new members in 2008, and the renewal rate has improved. The ongoing problem of payment by standing order continues. Although members have been instructed to cancel them, 12 remain whom the Membership Secretary is unable to contact and the BPS has to continue to accept their payments (often at an incorrect subscription rate). Members are reminded to update their email and contact details with the Membership Secretary. Of 318 fully paid-up members, 227 receive the *EJP* including 21 of the student members. The first three issues of volume 44 of the *European Journal of Psychology* have been distributed without problem and the team at Taylor and Francis has been extremely helpful in distributing copies of the journal to those members who have been late with their applications and renewals. Sara drew members' attention to her report in the Autumn 2009 issue of *The Psychologist*, alerting members to the services offered by Taylor and Francis via their informaworld platform. Members can currently renew online using PayPal but issues regarding the setting up of a PayPal business account remain unresolved and are to be discussed at Council. Renewal notices will be sent out in the next two months. To meet the increasing number of requests for financial assistance and to allow the



BPS to continue to generously support student members, it was agreed at the Summer Council meeting to amend the student subscription charges. A report published in the Autumn issue of *The Phycologist* proposed that the standard annual student membership be raised to £10 and that a new 3 year student membership (to cover the duration of a PhD) for £20 be introduced. Both proposals received unanimous approval. They will take effect from 2011 and the website will be updated. Sara thanked Michelle Tobin, Jane Pottas, GAC, Mike Guiry and Pier Kuipers for their help.

GAC thanked Sara for her work as Membership Secretary. The report was accepted: proposed by Matt Dring and seconded by John Raven.

d) Student Representative

Agnes Mols Mortensen reported that she has established good contact with the student members and that they had discussed areas of interest for potential workshop/lecture topics at the annual Winter Meetings. Multivariate statistics, scientific writing, molecular analysis and the building of phylogenetic trees were suggested. Agnes thanked the organizers of the 58th Annual Meeting for including a lecture (An introduction to multivariate data analysis in ecology) and a workshop (Careers in phycology) to meet the interests of student members. She had informed the students that she would not be at the meeting in Oban and apologized for her absence.

In the absence of the Agnes Mols Mortensen her report was accepted without comment. Proposed by Martha Clokie and seconded by Eileen Cox.

e) Editors-in-Chief of the European Journal of Phycology

Eileen Cox reported on behalf of herself and John Day. As part of the new Production agreement with Taylor & Francis, the page allocation for 2009 was increased and volume 44 part 4 was extended to reduce the current backlog of accepted, unpublished papers. In total, 50 papers have been published. As in previous volumes, there was a good spread of subjects and this will continue in volume 45. Significant efforts have been made to reduce both the manuscript processing time and the length of time between acceptance and publication in hard-copy. All manuscripts that were processed outside Manuscript Central were published by August 09 and all of the "problem" manuscripts on the Manuscript Central system have been dealt with. This has successfully reduced the average processing time for manuscripts and will, by volume 45, reduce the average time between acceptance and publication. On-line publication for the majority of manuscripts in 2009 preceded the hard-copy issue by 2 months, with a number of manuscripts being available on-line up to seven months prior to publication. Assistant Editors covering Microalgal Systematics (Elliot Shubert) and Macroalgal Systematics (Alison Sherwood) have been

appointed in the last year. Rejection rates remain high, with 60% of manuscripts being rejected. Rejection rates vary depending on the subject area, but more than sufficient good quality manuscripts are being received to fill the Journal. The Scholar-One/Manuscript Central system is working well with assistance provided by Elliot Shubert (Managing Editor). 104 manuscripts were submitted electronically in 2009 and no manuscripts are being processed outside the Manuscript Central system. The *EJP* impact factor has risen to 1.826, which is 25/87 journals in Marine and Freshwater Biology. This represents a 21% increase at a time when that of other phycology journals has fallen. On the data available for up to 2007, the percentage of papers with >5 citations has increased, with a reduction in the number of papers not being cited and the 5 year impact factor is >2, suggesting that the papers have long term value. The journal publishes a good spread of papers from many countries, confirming its international recognition. T&F continue to put in considerable efforts and resources to develop and market *EJP* which they consider one of their "flagship" journals and are keen to explore opportunities to enhance the journal further. Both EICs are stepping down (Eileen Cox having served 6 years, John Day is resigning due to changed professional position) and there will be a period of transition over the next 12 months until David Mann takes over as Editor-in-Chief. T&F will produce corrected updated lists of editors and assistant editors. Eileen expressed their thanks to all the Assistant Editors and to Elliot Shubert as Managing Editor and the team at T&F for all their support, assistance, goodwill and hard work during their tenure as EICs of *EJP*. Two prizes were awarded for the best papers, nominated by the Assistant Editors. The best paper went to **Theriot, E.C.**, Cannone, J. J., Gutell, R.R. & Alverson, A.J. (The limits of nuclear-encoded SSU rDNA for resolving diatom phylogeny - *EJP* 44: 277-290); the best paper by a young investigator to **Harris, G.N.**, Scanlan, D.J. & Geider, R.J. (Responses of *Emiliana huxleyi* [Prymnesiophyceae] to step changes in photon flux density, *EJP* 44:31-48).

Frithjof Küpper commented that he was still concerned over the length of time to publication. This is being addressed by getting papers onto iFirst to minimise delays. Many papers are rejected on technical grounds because authors do not follow instructions. There is a problem (a) getting reviewers and (b) getting them to review on time but in future they will be harried and may not be used again if they are slow to review. Eileen urged anyone who was asked to review to accept.

GAC commented that *EJP* has a global readership and impact and thanked Eileen, John and Elliot on behalf of the BPS for all their hard work. The report was accepted: proposed by Michelle Tobin and seconded by John Raven.

f) Editor of The Phycologist

Jan Krokowski reported that there were no major problems, the 2009 spring issue was printed and dispatched

by mid-April, and although the autumn issue was delayed by the postal strike it was dispatched by early November. The layout and typesetting continue to be expertly provided by Ms Agnès Marhadour, in Portugal. Printing continues to be provided by Monument Press in Stirling, Scotland. Typesetting costs have remained constant since 2005 but there has been a steady increase in overall cost, attributable to increased contributions for the autumn editions and increasing postage. The current annual cost of the newsletter (spring and autumn) is £8.98 per member. Jan reiterated that without the members' support the newsletter would not exist and he encouraged all BPS members to make contributions. The deadline for submission of articles for spring is March 1st, and 1st September for the autumn edition. He thanked SEPA's Administration staff in East Kilbride (Donna Farren, Dorothy Fotheringham and Kirsten Tracey) for their enormous continued help in posting the newsletters.

In the absence of Jan Krokowski, GAC thanked him for his excellent work in editing *The Phycologist* which is regarded as a flagship feature of the Society, and his report was accepted: proposed by Martyn Kelly and seconded by Michelle Tobin.

g) *Webmaster*

Mike Guiry reported that the British Phycological Society website had been maintained continuously from the University of Galway server for the last six months with very little interruption. The server's records indicate an up-time of 99.99%. Traffic increased 12.78% for the period 10 Dec 2008 to 10 Dec 2009. The pattern of usage is still the same as previously reported. As previously, the on-line payment of subscriptions is giving some difficulties and Pier Kuipers, Michelle Tobin and Sara Marsham are working together to introduce a PayPal-based system of credit-card payment.

In the absence of Mike Guiry, GAC thanked him for his work on the website and his report was accepted: proposed by David Mann and seconded by Matt Dring.

h) *Student Awards and Training Committee*

GAC (Chair A & T Committee) reported that the Committee had refined the guidelines (deadlines, eligibility, Society membership requirements) for the Student Bursaries and Student Undergraduate Research Project schemes; worked on the establishment of the new Project Awards scheme (aims, scope, conditions of award, application procedure), details of which are available via BPS website from July 2009; and evaluated 37 applications by BPS Members for funding support. A wide range of eligible activities had been supported this year, with applications having been received from Croatia, France, Germany, India, Ireland, Turkey and the UK. The total sum awarded, January - December 2009 inclusive, was ca. £13,970 (Student Bursaries: 30 applications, 23 awards; Summer Undergraduate Projects: 2 applications, 2 awards; Project Awards: 5 applications, 1 award). Applications had

been rejected because they had missed publicised deadlines (October 1st and December 1st), or due to ineligibility of the applicant or because specified information had been missing. Applicants were urged to read the funding guidelines. A 3-month requirement for membership of the BPS before being eligible to apply for BPS funding is now in place for postgraduate student applications (other than for support to attend BPS Annual Meetings). Applicants to all BPS schemes are advised to seek partial financial support from elsewhere and to indicate the source and amount of such support. Whilst this is not mandatory, it is a useful factor in enabling the Society to distribute its own funds more widely. Virtually all of the awards made by the BPS in 2009 were thus partial awards. The awards scheme policy is to be reviewed in June 2010. The Fritsch Collection Project Grant Application was considered and an offer of support (£3000), with conditional requirements, had been made by the President but was not accepted due to changed circumstances.

GAC thanked Michelle Tobin, Rupert Perkins and Gill Malin for their work on the Committee and Prof. Mike Guiry for his help with webpage additions and changes. The report was accepted: proposed by Martin Wilkinson and seconded by Frithjof Küpper.

i) *Biodiversity and Conservation Committee*

Martin Wilkinson (Chair B & C Committee) reported that the Committee had met twice in 2009. The 2nd edition of the Freshwater Flora is on schedule for submission of edited copy to CUP in April 2010. Bob Fletcher has completed a draft of the manuscript of Seaweeds of the British Isles, Brown Seaweeds Volume, Part 2 and Bill Farnham is currently reviewing it. The Green Seaweed volume continues to sell well. Stock of those parts in print of The Seaweeds of the British Isles has been transferred from NHM to the NHBS which should improve marketing but 3 parts are now completely sold out and rewriting or reprinting is being considered by the Committee. The Seasearch Seaweed Guide is being produced by Francis Bunker and Chris Maggs for the Marine Conservation Society with BPS support. The Big Seaweed Search was launched on 21st August 2009 from the Natural History Museum with the support of OPAL. This will involve the public in mapping some of our commonest seaweeds. It is really important to have such outreach projects to involve the public in our subject especially in view of possible climate change implications. Attractive identification and explanatory leaflets to help the public have been designed. Another mass observation project on freshwater pond life might have algae and higher plants included. A proposed link with Plymouth for a seaweed recording scheme was not successful. The NHM is developing a database which will take time to come to fruition. The usual regular field meetings and workshops have continued - (i) Seaweeds Chris Maggs and Francis Bunker, Pembrokeshire, May; (ii) Freshwater, Durham - Dave John and Brian Whitton (iii) Diatoms, Kindrogan - Eileen Cox and Elliot Shubert. A



marine workshop on Coralline and Other Algal Crusts has been organised for 1-3 February 2010 at the Plymouth Marine Laboratory by Juliet Brodie, Jason Hall-Spencer and Chris Maggs. Martin is to write a report on the work of the Committee for *The Phycologist*.

GAC thanked Martin Wilkinson and the B & C Committee for their work and the report was accepted: proposed by Dave Jewson and seconded by Martyn Kelly.

5. President's Award

No report due to the absence of the President. The definition and administration of this scheme and selection of recipient(s) is to be a matter for the BPS President. The President will consult the A & TC in the assessment and decision-making process.

6. Federation Reports

a) Federation of European Phycological Societies (FEPS)

GAC reported that the latest Council Meeting and 2009 AGM of FEPS were held at the Natural History Museum, London, on 23 June 2009. In addition to the new membership of the French Phycological Society (April 2009), arrangements are in progress (from Nov. 2009) to enrol the Czech Phycological Society in the Federation. These additions increase the membership of constituted national phycological societies/groups to 10, representing 12 European national phycological groups, namely: Belgium, The Czech Republic, France, Germany, Greece, Hungary, Ireland, Italy, The Netherlands, Poland, Spain and the United Kingdom. FEPS is considering the establishment of a pan-European Directory of Experts in phycology, its ramifications and applications. This idea is also currently being pursued at national level by some national Member Societies (e.g. BPS). The FEPS website is under development at <http://www.feps-algae.eu/cms/>. Good progress continues on the organisation of the Fifth European Phycological Congress: *Exploring the Phycocosmos: A European Perspective* (September 4-9, 2011, Rhodes). Discussions are in progress with Taylor & Francis regarding the publication of the FEPS journal, *Perspectives in Phycology*. The report was accepted: proposed by Michelle Tobin and seconded by James Metcalf.

b) Federation of European Microbiological Societies (FEMS)

No report in the absence of Paul Hayes.

c) Society of Biology

No report in the absence of Paul Hayes.

7. Hilda Canter-Lund Prize

Martyn Kelly reported that 23 entries had been received from around the world but only three from the UK, which he felt was rather disappointing. Martyn and David Mann (the judges of the prize) will write an article for *The Phycologist* outlining the ways in which images can be

enhanced. The winner of the prize is Dr Mariano Sironi, Associate Professor in Vertebrate Zoology at the National University of Córdoba, Argentina for his photograph of a southern right whale mother with her calf swimming along the shores of Peninsula Valdes in Argentina in a green tide tentatively composed of *Lepidodinium* sp. The winning photograph and other entries may be seen on the BPS website.

Elliot Shubert enquired whether the winning image could be printed and framed to be auctioned at next year's Winter Meeting to raise funds for the Society. This is possible as the owner retains copyright but the BPS has rights for two years.

GAC thanked Martyn and David for their work in organising and judging the competition.

8. Future Meetings

The 2011 winter meeting is to be held in Cardiff where Rupert Perkins is the local organiser.

9. Membership

The term of office of three Ordinary Members of Council has come to an end. GAC thanked retiring Council members Martha Clokie, David Mann and Thomas Proeschold. Five nominations were received and a ballot was organised in November 2009 to elect three new members. Those elected to office were Eileen Bresnan (proposed by Jan Krokowski and seconded by Sara Marsham), Gill Malin (proposed by Juliet Brodie and seconded by Paul Hayes) and Linda Medlin (proposed by Richard Crawford and seconded by Jane Pottas). All accepted their nomination and their election to Council.

10. Any other business

Ms Poonam Sharma thanked the Society for their support which allowed her to attend the Meeting.

On behalf of the Society, GAC thanked John Day and Christine Campbell for organising and hosting the Winter Meeting at the Scottish Association of Marine Science at Oban and Taylor & Francis for sponsoring the reception. He also thanked Jane Pottas for her secretarial work throughout the past year.

The meeting ended at 6.35pm.

A Ticket to Tokyo and to the IPC9 (2nd-8th August, 2009)



**Lucie Bittner, lucie.bittner@sb-roscoff.fr
PhD Student at the Muséum National d'Histoire Naturelle (MNHN, Paris) in August 2009
Post-doctoral Student at the Station Biologique de Roscoff (SBR, Roscoff, Brittany) since January 2010**

I have been diving into the seaweeds world for five years. The revelation took place in West of France in March 2005. At this time, I was a Master's student in Systematics, Evolution and Palaeontology, at the Muséum National d'Histoire Naturelle (MNHN) and the Pierre-et-Marie-Curie University, in Paris. I decided to attend a field course in Phycology to discover the "Station Biologique de Roscoff", in Brittany.

Since I was a child, I have always been interested in organisms and life forms around me. I would even say with hindsight that I wanted to understand the invisible link that could explain their diversity and their potential genealogical relationships. When I discovered the huge diversity of macroalgae in Roscoff, my pleasure and my curiosity as a naturalist reached a peak. In my opinion, seaweeds offer all possible fascinating research topics, and especially in the field of Evolution. This 'revelation' showed me the way for the following years. As I progressed in my Master's, I had the chance to study the evolution and the diversity of a brown algal lineage (Dictyotales, Phaeophyceae), and later during my PhD, of a red algal one (Corallinales, Rhodophyta).

When I applied to the financial support of the BPS, I was in my third and final year of PhD. However, two years before I already wished to attend the ninth International Phycological Congress (IPC9). The congress was planned to take place in Tokyo in August 2009. A gorgeous place but which required

some organization to find financial help in order to get such an expensive plane ticket from Europe to Japan. Consequently I spent some time writing a detailed CV and motivation letters in 2009. I was quite a lucky girl, because I finally got financial help first from the IPC9 organizer committee, and then from the BPS. After six months of suspense, waiting for the answer of the committees, I was finally able to get my flight ticket to Tokyo!

The IPC9 was a great congress. It was very well organized, and there was an impressive and wide variety of talks. Several times I had difficulties to choose between presentations that were given simultaneously. Most of all I enjoyed talking with people that make the phycological research and phycologist community lively. I felt also really fortunate to meet and exchange ideas with people I considered as revered giants of the phycological field.

Presenting a part of my PhD results in a poster at the IPC9 turned out to be a step forward into my doctoral researches. After months and many efforts on the field and in the lab trying to obtain data, developing optimal tools to analyze them, and most of all cogitating how to interpret results and to propose rational interpretations and conclusions, the warm and encouraging welcome of the phycological community was a great relief. I was particularly happy that on the last day of the congress, my work entitled 'Genetic diversity and species boundaries of Corallinales (Rhodophyta) in South Pacific Ocean' was granted best Student Poster Award by the Japanese Phycological Society (JPS); of course this prize goes entirely to my excellent and dazzling collaborators and supervisors: E. Bapteste, C. Flecher, B. de Reviers, L. Legall, C.E. Payri. Without them I would not have been able to do this. This prize energized me for the following two months during which I wrote my PhD manuscript and finished my doctoral research. I also believe that this award helped me to get my current excellent post-doctoral position.

I sincerely express my gratitude for the funding provided by the British Phycological Society (and also to all the organization that are good at supporting younger researchers). Without this, I would not have been able to attend the IPC9 conference. This meeting was an outstanding and rewarding experience, and it definitely showed me one more time that the phycologists constitute an open-minded and supporting community. I am (modestly) proud to contribute to it.



Freshwater Diatoms Field Course: Taxonomy and Biomonitoring at the Humboldt Field Research Institute in Steuben, Maine, USA

Haywood Dail Laughinghouse IV
PhD Student
MEES Graduate Program
University of Maryland, College
Park, USA
hdliv@hotmail.com

During the end of July, I attended a field course at the Humboldt Field Research Institute in Steuben, Maine. This is a very rural part of Maine, filled with fishing and lobster boats, nestled within the beautiful landscapes of lush forests and rocky shores on the Atlantic Ocean. After two flights and a bus ride, I was dropped off on the side of the highway at a small country store with hopes that the director of the Institute, Joerg Lotze, would pick me up. Not too long afterwards, Joerg arrived and we were on our way to the Institute.

After arriving at the Institute and getting lodging sorted, I was able to meet up with Dr. Jeff Johansen, who would be teaching the Course: Freshwater Diatoms: Taxonomy and Biomonitoring over the next week. Some other participants of the course were already in the room and we were able to look at some of the printed material and ask questions about the week that would follow.

The class unofficially began after dinner the same day when we presented ourselves. We were a diverse group, composed of students (undergraduate and graduate) and professionals (professor, environment agency, private firm, and retiree), so it was a nice mixture of backgrounds.

After an early breakfast the next day, classes formally began with lectures on diatom biology, ecology and morphology, followed



Participants to the field course.

by lectures into the different diatom groups focusing on the most common genera, occurring in lakes and streams. Lectures were followed by extensive microscope work, with the availability of part of Jeff's private library, which he had brought with him, along with a wonderful microscope with Nomarski optics.

The days were long, since we got together in the morning, afternoon and evening, to go over as much material as possible. Classes were fun, since the instructor was capable of transmitting his passion for this group in an enthusiastic manner. Jeff was also readily available to clarify our doubts on species we saw, as well as indicate literature where we can find the answers ourselves.

There were a few fieldtrips during the course of the week, to some streams and lakes of the region and also to many wet walls on the property where the Institute is located. In these different

locations, we were able to collect diatoms from several aquatic, terrestrial and subaerophytic environments. In class we learned different mounting techniques, observed and drew many different species on notecards, and afterwards, their application in water quality assessment.

This course was wonderful, and would suggest it to both people with and without experience in diatom taxonomy. I am grateful to the British Phycological Society for financial support to attend this field course, and to the Humboldt Institute for a partial student scholarship.

Young Investigator Award

Gayle Harris
gayle_4@hotmail.com

I am honoured that my paper, Responses of *Emiliana huxleyi* [Prymnesiophyceae] to step changes in photon flux density, was judged the best paper by a young investigator last year and I thank the *European Journal of Phycology* for giving me the award.

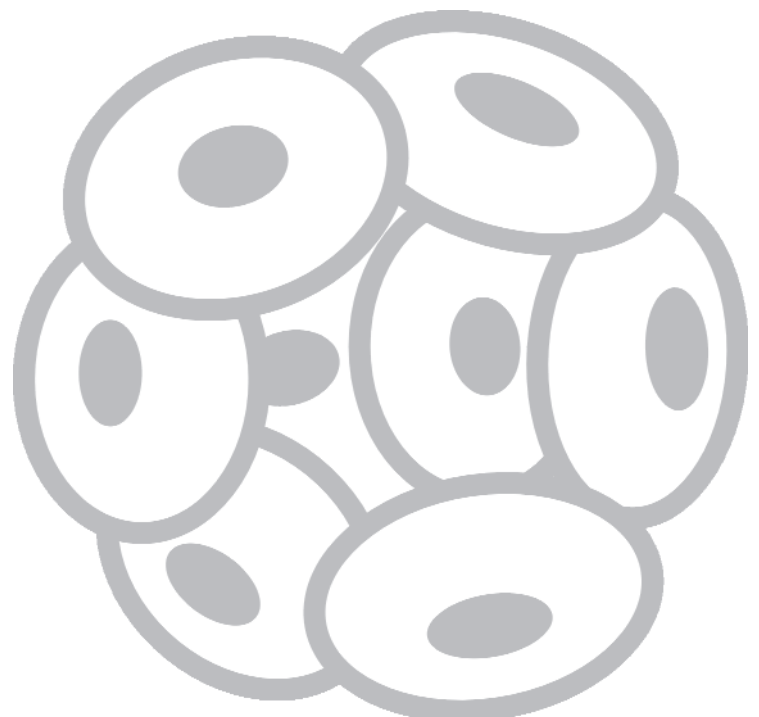
This paper was part of my PhD where physiology was combined with molecular biology in order to investigate the photophysiological characteristics of a non-calcifying strain of *E. huxleyi* and the regulation of the fucoxanthin chlorophyll *a/c* binding proteins (FCP) and the large subunit of Ribulose 1,5 biphosphate carboxylase/oxygenase (RbcL) from *E. huxleyi* in response to different growth PFDs as well as following reciprocal shifts between low ($50 \mu\text{mol photons m}^{-2} \text{s}^{-1}$) and high ($800 \mu\text{mol photons m}^{-2} \text{s}^{-1}$) PFD. The response to stresses imposed on marine algae allows us to gain information on the mechanisms that organisms use to exploit environmental resources or cope with environmental stresses.



I must thank my supervisors, David Scanlan and Richard Geider for their continued support and unfailing belief in me during my PhD. Without their help, substantial input into this paper and attention to detail I doubt that I would be writing this article.

Currently I am a secondary school science teacher and still very much excited by science, which I hope to use to inspire and encourage the next generation of researchers!

Harris, G.N., Scanlan, D.J. & Geider, R.J. 2009 Responses of *Emiliana huxleyi* [Prymnesiophyceae] to step changes in photon flux density, *EJP* 44:31-48.





Advanced Freshwater Course on Blue-Green and Green Algal Identification (Durham, UK)

Pauline Lang
Scottish Environment
Protection Agency
pauline.lang@sepa.org.uk

As a Phytoplankton Ecologist for the Scottish Environment Protection Agency (SEPA), I was extremely interested in attending the advanced course on blue-green and green algal identification run by Prof Brian Whitton (University of Durham) and Prof Dave John (Natural History Museum London) in July 2009. The venue for the course was the Hilde-Bede College and School of Education, part of the University of Durham. This long-standing building gazes out over the city, with picturesque views of the surrounding landscape and the River Wear.

Upon my arrival I discovered this course had attracted a number of attendees not only from other parts of the UK but had a global impact, with visitors of ranging nationality from America, New Zealand and Asia. Similarly, though our motive for attending the course was fundamentally the same and what brought us altogether (i.e. to gain advanced skills in algal identification), our background roles were actually quite varied with a mix of other environment agency staff, consultancy employees, post-graduate students and research assistants. Over the course of the week, I made not only useful contacts but also new friends among them.

Although the format of the course itself was rather intensive, with early starts and late finishes, this was absolutely necessary to get through the practical work, lecture material and field excursion



that the organisers had prepared. Living up to its name the course focussed on the identification of blue-green and green algae, where possible to species level, with a useful opportunity to examine samples collected from waterbodies of ranging water quality and habitat conditions. The course tutors were truly enthusiastic and willing to help with any queries, no matter how trivial, providing some invaluable tips on troublesome taxa along the way. Lectures were very interesting and informative, covering the classification, morphology and ecology of algae in some detail, with Brian leading on his area of expertise in cyanobacteria and Dave presenting his forte on the Chlorophyta. Invited speaker Dr Alan Donaldson instructed us on the use of the CD-ROM identification keys to the blue-green and green algae, of which we received a complimentary copy at the end of the course. The field trip to Sunbiggin Tarn region (Cumbria) proved a thoroughly

enjoyable outing and an occasion to collect our own algal samples for analysis back in the lab.

Accommodation was basic but comfortable and very handy for the course because rooms were based within the college itself. The meals provided on the course were of superb quality throughout and all dietary requirements were meticulously prepared. In the evenings we always found time for a few relaxing drinks in the local pub overlooking the river, often accompanied by some useful discussions and interesting debates between Brian and Dave.

I would highly recommend this course to anyone requiring to identify algal specimens to the lowest taxonomic level possible as part of their work or study. Also it was a pleasure to work alongside Brian and Dave, both extremely well renowned individuals in the field of freshwater phycology.

William Henry Harvey's Grave Rediscovered

William Henry Harvey, a modest Victorian botanist, is one of the best-known marine phycologists in the world, having described over 750 species and in excess of 70 genera of algae.

He was born in 1811 at Summerhill, a country house on the banks of the Shannon in County Limerick, Ireland, in 1855 to a prominent Quaker family that originated at Youghal, County Cork. The young William initially attended Newtown School, County Waterford for children of the Religious Society of Friends but, at 13, was moved to another famous Quaker boarding school at Ballintore, County Kildare, run by an innovative headmaster, James White, and which had numbered such luminaries as Edmund Burke and Napper Tandy amongst its pupils. Here he received an excellent education and was strongly influenced by White and by his French teacher, Theodore Eugène Suliot, while also becoming passionately interested in natural history.

As the youngest of 11 children, William was clearly indulged by the family, and after finishing his education, he returned to Limerick to be an amanuensis to his father, Joseph Massey Harvey. Showing no interest in his father's merchant business, much of his time, like the young Charles Darwin, he spent pursuing natural history, and he soon began a correspondence with William Jackson Hooker (1785-1865), then Regius Professor of Botany at Glasgow University. Amongst other activities, Harvey undertook some of the algae for W.J. Hooker's *English flora* (1833) and the Irish algae for J.T. Mackay's *Flora hibernica* (1836), which quickly gained him a reputation as a botanist of the highest calibre.

Through a neighbour, a Member of Parliament in London and then Joint Secretary to the Treasury, Thomas Spring Rice (1790-1866, 1st Baron Monteagle of Brandon), his name was put forward for the post of Treasurer-General of the Cape Colony. Due to a misunderstanding in London, his brother Joseph was appointed instead. Undeterred, the brothers embarked in 1835 for the Cape, but Joseph was not suited to the Cape climate; he fell ill almost immediately, and, dying within a year on the way home, he was buried at sea. Harvey returned to Ireland, but was soon appointed to his brother's position, this time correctly, and he embarked for Cape Town in 1836.

Harvey was almost lost to phycology as, unsurprisingly, he had become besotted by the extraordinarily diverse Cape higher-plant flora. His post at the Cape was essentially a sinecure, something that he freely admitted, rather ingenuously writing: 'I have taken so many excursions lately that I almost fear I shall earn the sobriquet of Her Majesty's [Victoria's] pleasurer general'. The outcome was *Genera of South African Plants* (Cape Town, 1838) and *Flora capensis* (3 vols, Cape Town & Dublin, 1859-1865; 7 vols were eventually published), co-authored with Otto Wilhelm Sonder (1812-1881) of Hamburg. Around this time, Harvey fell ill, although the details are vague, and had to return to London in 1842. This may have been the onset of life-long ill-health-almost certainly caused by tuberculosis-that was to result eventually in his premature demise at the age of 55.

Harvey's sojourn in South Africa seems to have given him a taste for travelling and, to him, far-away algal floras always

seemed greener, but he could not indulge this interest without some financial security. On his return to Ireland, he sought in 1843-44 the post of Professor and Curator of the Herbarium at Trinity College Dublin (TCD). In order to be considered for the post, a medical doctorate had to be arranged, which seemed not to present any difficulty to his contacts. Duly awarded an M.D. on February 18th, 1844, *honoris causa*, by TCD, he was promptly turned down for the professorship, seemingly on the grounds that an honorary medical degree was insufficient, and George James Allman (1812-1898) was appointed, only a year after obtaining his degree, succeeding William Allman (1776-1846, apparently not a relative, despite claims that they were father and son). However, TCD, with G.J. Allman's agreement, separated the post of Curatorship and appointed Harvey. In a letter dated Feb. 18th, 1844 (Anon. 1869), Harvey refers to being 'married' to the '...Old Lady [TCD] ...who gives me an annual sum for pin money, with a suite of rooms...', and he seems well contented with the match. In 1848, the Royal Dublin Society (founded as the Dublin Society in 1731 "to promote and develop agriculture, arts, industry, and science in Ireland", and becoming "Royal" in 1820 through the patronship of George IV shortly after his accession to the throne) elected him to a Professorship, which required a canvass of the RDS membership, a process most distasteful to the taciturn Harvey, as described in some letters from this period (Anon. 1869).

Harvey's connections, as you will have divined by now, dear reader, were excellent. He was, like Charles Darwin, firm friends with Sir Joseph Dalton Hooker (1817-1911, second son of W.J. Hooker, and succeeding him as Director of the Royal Botanic Gardens at Kew in London), by then the most powerful botanist in the burgeoning Empire, although Joseph Hooker would later write to Darwin that "Harvey in Dublin" was not at all happy with the central tenets of the *Origin of Species*. Harvey was to affirm his strong faith in a publication entitled *Charles and Josiah, or Friendly conversations between a churchman and a Quaker* (Dublin & London, 1862), mainly written while travelling in the southern hemisphere.

Harvey began in the late 1840s-in the midst of preparing his seminal *Phycologia britannica* (issued in more or less monthly fascicles between 1846 and 1851) - to make plans for a visit to the southern ocean, and in 1853 he embarked on a 3-year circumnavigation of the world with stays in South Africa, Ceylon [Sri Lanka], Australia, New Zealand, Tonga, Fiji, and South America. In Australia, he collected a huge number of specimens for his 5-volume *Phycologia australica*, subscriptions to which were sold in advance, partly to fund his travels. Sets of specimens were also widely distributed, and these turn up in herbaria all over the world, although the types from this period are mainly in a bound "Travelling Set" preserved separately in the herbarium at TCD.

Harvey undertook a separate voyage to the Friendly Islands (Tonga) from Sydney with missionaries on the *John Wesley*, and again became seriously ill at this time. On his way home, via Chile, he was laid up for an extended period at Valparaiso. He returned to Dublin in October 1856. G.J. Allman, having been appointed to the Professorship of Natural History at



Edinburgh, vacated the Professorship at TCD, and Harvey was at last appointed to the post, which he was to hold until his death in 1866. The impediment of the honorary M.D. seemed to have disappeared, probably waived in light of Harvey's international reputation. There are statements in various accounts of his life that he converted to the (Anglican) Church of Ireland in order to secure the appointment.

In 1861, he married Miss Phelps, a childhood friend from Limerick, but during a lecture at Glasnevin in that year, he suffered a severe haemorrhage, and thus began a slow decline over the next five years.

It is widely known that Harvey died in Torquay in Devon, England, something that at first glance seems strange. He was advised medically to go there (and to France) because of a more equitable climate, and he and his wife went in 1866 to stay with Maria Hooker (1797-1872, eldest daughter of Dawson Turner), the widow of W.J. Hooker, who had died the previous year. Sadly, Harvey having become progressively weaker, died on the 15 of May, and was buried in Torquay in accordance with his wishes. With true Victorian grit, Harvey dictated, and weakly signed, letters to his friends even on his deathbed (Anon. 1869).

Mrs Alfred Gatty (Margaret Gatty, 1809-1873) writes in a letter in the possession of one of us (MDG) to Lady Hooker dated May 17, 1866:

"Eye hat not seen, nor ear heard, neither have entered into the heart of man, the things that God hath prepared for them that love Him.' Cor[inthians], Chap[er] 2, V[erse] 9. Unless other words have been thought of may I ask you to consider these if any are [to be] written on his gravestone. For the loving naturalist who saw the Almighty through the wonder of His works here, the text seem to me appropriate."

On several occasions, MDG asked Gerald Boalch (GTB) if he knew of the location of Harvey's grave in Torquay, but no opportunity arose for a search. In March 2009, however, GTB and Akira Peters (AFP) went to the municipal graveyard at Torquay (mistakenly referred to as a "churtyard" in Anon. 1869). With great efficiency, the officials at the graveyard were able to give them the grave number, the row in which it occurred and the area in which it was located. Unfortunately, the searchers did not know where the numbering of the rows started so GTB and AFP had quite a hunt. The graveyard people then provided a list of the names of the adjacent graves, so after they had found what they thought was the right area, a more intensive search was started. Eventually they saw a stone almost buried in the grass where they thought the grave should be. After pulling back the grass sward they found a long centrally ridged slab on the ground (Fig. 1), and on one side they were just able to make out "William Henry Harvey" and perhaps "Professor of Botany" and "1866" (Fig. 2). The grave was very overgrown, and the letters were difficult to read. The stone, probably some sort of limestone, is quite eroded, and appears to be damaged at one end. Not far away was the grave of Lady Hooker. This was a stone of a similar shape but was of highly polished red granite and had obviously been maintained, and was in very good condition. The modesty and the lack of an erect stone on Harvey's grave is perhaps because Quaker graves are by tradition minimally marked.



Fig. 1. Dr Akira Peters uncovering the gravestone of W.H. Harvey. (Photo: Dr G.T. Boalch)



Fig. 2. Lettering on the gravestone; see text). (Photo: Dr A. Peters)

It is gratifying to discover the grave of this prominent Irish traveller, botanist and phycologist, and whilst the grass is encroaching on the stone and making it hard to find, and difficult to read the inscription, it is likely that the grass has served as a protection. The searchers have carefully replaced the sward. The *Memoir of W.H. Harvey* (Anon 1869, p. viii) mentions a "plain marble slab".

Tuberculosis, which afflicted the driven and the diligent at this time, decimated the Harvey family, with several of William's siblings apparently succumbing. It was to remain a major killer in Britain and Ireland until the late 1950s.

Harvey's writings and correspondence make it very clear that he was a kindly, unassuming man, with strong religious convictions, and he would surely be very pleased with his modest gravestone.

Michael D. Guiry, Gerald T. Boalch and Akira F. Peters

Acknowledgement

We are very grateful to Professor M.J. Wynne for his help.

Reference

Anon. [Fisher, L.J.] 1869. *Memoir of W.H. Harvey, M.D., F.R.S., etc. etc. Late Professor of Botany at Trinity College, Dublin. With selections from his journal and correspondence.* pp. viii + 372, Bell & Daldy, London. [Mrs Lydia Jane Fisher was a cousin of Harvey's who published the Memoir anonymously.]

Stoneworts at Yardley Chase, Northamptonshire (UK)

Yardley Chase in Northamptonshire (UK) contains a unique pond system born out of the artefacts of the Second World War and narrowly escaped being levelled for a third London airport. In 1940 it was an important ammunition storage depot with its own dedicated railway system. The matériel was stored in about 44 large brick bunkers distributed over about 300 hectares; each bunker was surrounded by high earth blast walls scooped out of the surrounding land. Deep "borrow pits" were left, 4 to 6 at most bunkers, which quickly filled with water and were developed serendipitously into fire fighting reservoirs with interconnected ditches. After the war the bunkers were used for a variety of purposes and the old borrow pits saw an explosion of life as stoneworts arrived followed by pondweeds and an adapting population of diatoms, cyanophytes and desmids. So it is to this day - but as the woodland has grown back, leaf litter, increased shade, fallen branches reeds and silt all change the algal flora.

Stoneworts have been known at Yardley Chase since at least 1890 but came to prominence once the bunker ponds were first surveyed in detail by Crawford, Stewart and Wade from 1984 to 1996 (unpublished, N.F. Stewart data); the area is designated an 'Important Stonewort Area' (see Stewart 2004). Since that time the landscape has changed through growth of trees and understorey; this has led to loss of stoneworts in those ponds most affected by leaf litter, silting and possibly acidification. Over 100 (out of 119) separate ponds have now been re-examined and stoneworts were found in about half of them; the results are below and compared with the original survey.

The main observation here is the decline in *Chara hispida*, the apparent increase in the proportion of *Chara globularis* is unexplained. 8 ponds were identified in which the stoneworts have disappeared but 4 were identified as now having them. Despite the decline, Yardley Chase is still very much an *Area of Special Importance for Stoneworts*.

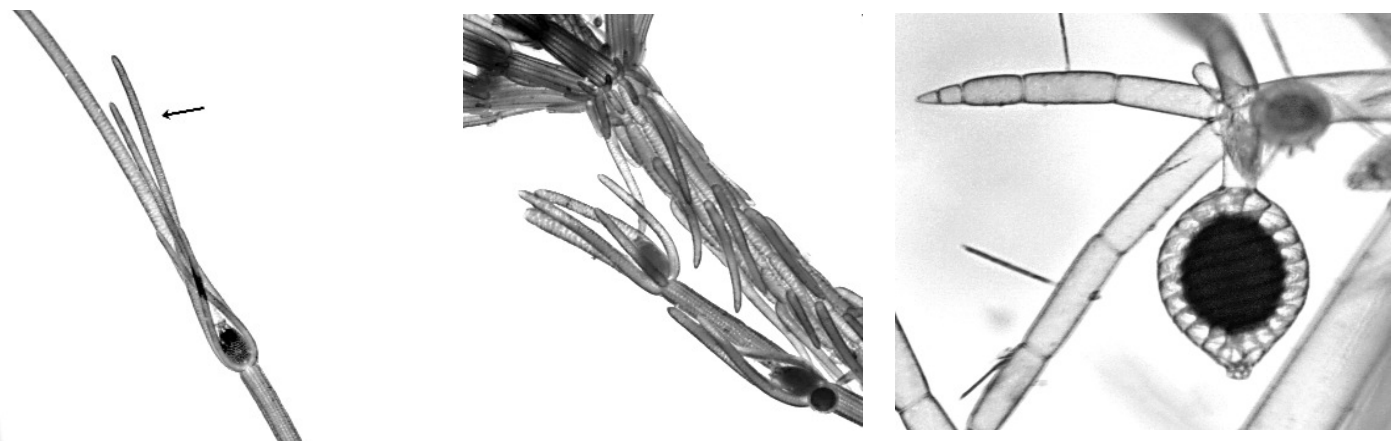
As well as growing in some of the bunker ponds, *Chara vulgaris* thrives in numerous deep ruts in other parts of the area, but therein it is always the form known as "var *vulgaris*", with short spine cells. Some authors have recognised "var *papillata*" with very long spine cells and "var *longibractiata*" with long bract cells. Both these forms have indeed been noted at one particular bunker complex, in two closely adjacent ponds. This observation would appear to count against a purely environmental cause for the difference. *Chara vulgaris* is notorious for its mysterious variability so maybe observations in this location taken over several years will be of value.

Tolypella intricata was found in one boundary ditch between 2004 and 2006 and had not reappeared by 2010. None of the *Tolypella* species are common and '*intricata*' is the rarest of those that are not extinct. Essentially, it is a plant of clean alkaline water free of pollution and without competition from other plants or algae. It tends to grow as an annual in ephemeral ponds and ditches and benefits from disturbance during summer grazing but is intolerant of agricultural 'improvement' (see Stewart & Church 1992). This story at Yardley Chase is entirely typical of what is known of *Tolypella*: the scenario of a recently cleared ditch bordering an old drove road, near ancient woodland, adjacent to farmland and with a measure of animal disturbance. The disappearance is also to be expected and such an event may even be a necessary part of the life cycle. With luck, the spores will still be there and will grow again when the right conditions return.

Christopher F. Carter

References

- Stewart, N.F (2004) Important Stonewort Areas of the United Kingdom. Plantlife International. Salisbury UK.
 Stewart, N.F. & Church, J. M. (1992) Red Data Books of Britain and Ireland: Stoneworts. The Joint Nature Conservation Committee, Peterborough.



From left to right: Fig. 1. *Chara vulgaris* var. *papillata* showing the long spine cells; Fig. 2. *Chara vulgaris* var. *longibractiata* showing (arrow) the long bract cells; Fig. 3. *Tolypella intricata* showing the oogonium and some epiphytic *Synedra*.

Table 1. Percentage distribution of species in each survey period

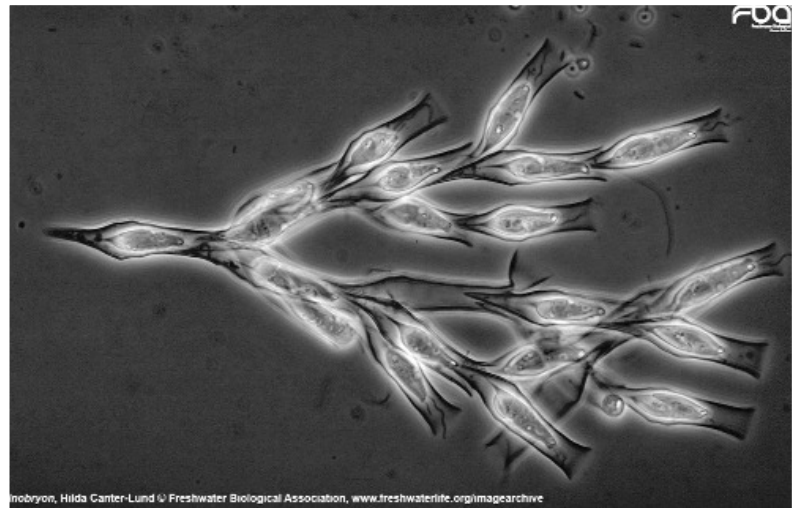
| | <i>C. contraria</i> | <i>C. globularis</i> | <i>C. hispida</i> | <i>C. virgata</i> | <i>C. vulgaris</i> |
|--------|---------------------|----------------------|-------------------|-------------------|--------------------|
| 1966 | 4 | 14 | 21 | 40 | 21 |
| 2007-9 | 3 | 19 | 16 | 42 | 20 |



2010 Hilda Canter-Lund Photography Award

The British Phycological Society invites entries for the 2010 Hilda Canter-Lund Photography Award, for a photograph on a phycological theme. The competition was established in memory of Hilda Canter-Lund, whose stunning photographs will be known to many. Her photomicrographs of freshwater combined high technical and aesthetic qualities whilst still capturing the quintessence of the organisms she was studying. A prize of £150 will be awarded to the photograph that best combines these informative, technical and aesthetic qualities. It can be of a micro- or macroalga, marine or freshwater, taken by any photographic medium and the competition is open to all (not just BPS members). The closing date this year is 31 October.

The 2009 shortlist can be seen on http://www.brphycsoc.org/Hilda_Canter-Lund_Prize.lasso. You can also download a pdf of the competition rules from this site. To enter, please send a jpeg (maximum size: 1 Mb) to MGKelly@bowburn-consultancy.co.uk, along with your name and contact details. The filename should be your name (e.g. Joe_Bloggs.jpg). No additional information is required at this stage. The original image, which will be requested for all shortlisted entries, must be capable of being viewed and printed at 20 x 30 cm without loss of image quality (see rules for more details). You (or your employer) must own the copyright of the image and be prepared to let the BPS use this image for at least two years as a condition of entry.



59th Winter Meeting, Cardiff 2011



First Circular

The 59th Winter Meeting of the British Phycological Society will take place in Cardiff, Wales between Wednesday 5th and Friday 7th January 2011, inclusive. The venue is the Parc Thistle hotel:

http://www.thistle.com/en/hotels/united_kingdom/cardiff/the_parc_hotel/index.html

The meeting will run in two main conference rooms in the hotel, with a meetings room available for break out sessions throughout the duration. It is planned to hold the BPS Council meeting on the morning of Wed 5th Jan. Registration will commence at 12:00 on Wednesday 5th Jan, with the first session also starting that afternoon at 14:00. Evening events will follow the format of previous years, with a Wine and Cheese poster reception session on the Wednesday 5th, informal meal with auction and quiz on the Thursday 6th and Conference Dinner on the Friday 7th January. Details of the scientific and social programmes will be included in the second circular and hosted on both the BPS website. There will be two special sessions during the meeting: Phagotrophy in the Evolution and Ecology of Algae chaired by Prof. John Raven, and The Phycology of Estuaries, Barrages and Lagoons chaired by Prof. Martin Wilkinson. Details of guest speakers will be announced in the second circular.

Abstracts

In order to finalise the scientific programme, contributors should complete and return the abstract form by 29th October 2010. Please indicate whether you are offering an oral or poster presentation. Students should indicate whether they are entering the Manton Prize or Student Poster competitions. The criteria for the Manton Prize and Student Poster awards are available in a downloadable PDF available from the BPS website. Invited presentations for the two special sessions should be planned to last 20 minutes with 5 minutes for questions. Offered oral presentations should be planned to last 12 min with 3 min for questions. Presenters

should bring their presentations on a memory stick (not CD), in a PC compatible form, ensuring that the file is clearly labelled with their name.

Posters should be prepared to fit a maximum size of 85 cm wide, 120 cm high (portrait layout). Larger posters can not be accommodated. The number of posters accepted is capped at 40.

Please send your abstract(s) electronically as a word document to BPSCardiff@Cardiff.ac.uk.

It is planned that there will be a special student lecture on multivariate statistics (See the 2nd Circular to follow) as well as the usual Manton Prize presentations.

Registration

Registration forms are available on the BPS website and should be sent with payment to Dr R Perkins at Cardiff University at the address on the form. The deadline for registration is the 29th October 2010. There will be a late payment charge of £20 for registration after this date (this does not apply for student registration, deadline being the 30th November). The costs of the meeting will include tea, coffee, lunches, receptions, evening meal/ conference.

Accommodation and travel

The registration fee does not include accommodation or breakfast which should be booked by delegates themselves. The Parc Thistle has reserved 50 rooms at the special price of £79 GBP per night for delegates. Advice on other accommodation will be supplied in the Second Circular. Travel to Cardiff is extremely easy and the use of rail or coach is advised as parking locally is very limited and expensive. The Parc Thistle hotel is 5 minutes walking distance from Queens Street station, one stop away from Cardiff Central Station, or about 15 minutes walk from the latter. National Express and Megabus run coaches to Cardiff from most main towns and cities.



1st Meeting of the Steering Committee of the Project "Brown algal biodiversity and ecology in the Eastern Mediterranean Sea" supported by TOTAL FOUNDATION

On March 23, the University of Athens hosted the launch meeting of the Steering Committee of a 4-year project, entitled "Brown algal biodiversity and ecology in the Eastern Mediterranean Sea". Led by Christos Katsaros (University of Athens), Panayotis Panayiotidis (Hellenic Centre for Marine Research / HCMR, Anavyssos), Konstantinos Tsiamis (Hellenic Centre for Marine Research / HCMR, Anavyssos) and Frithjof C. Küpper (Scottish Association for Marine Science, Oban, Scotland), the € 300,000 project, funded by the Paris-based TOTAL Foundation, aims to achieve a more comprehensive understanding of the region's seaweed biodiversity and its role in the functioning of the marine ecosystem.

The project is a truly multinational effort - even though the effort is cantered in Greece, it has major contributions by scientists from Croatia, Cyprus, Turkey, Israel, California, France, Germany, Japan and Scotland. Key objectives include pioneering studies of the Eastern Mediterranean's deep-water flora, hitherto largely unexplored.

Prof. Christos Katsaros, the Project Coordinator, commented: "This project will be a great opportunity to focus on the effects of climate change, pollution and invasive species on the Mediterranean Ecosystem. Within the framework of the project a dedicated seaweed herbarium will be established, including a database in which all the specimens collected during the expeditions will be deposited."

"No comprehensive inventory of the region's seaweed flora exists for the so far, despite the important role of these algae in the ecology of coastal and seabed ecosystems" said Dr. Panayotidis, the Lead Scientist. "In particular, we want to investigate whether kelps - large, meter-sized brown algae - occur in the deeper waters of the Aegean and Levantine Seas. For this purpose, we will use the HCMR research submersible, Thetis".

"That level of cooperation between marine scientists in Greece, Turkey and Cyprus is something very special about this project, bridging the difficult political differences between their home countries. Science is a wonderful way to contribute to promoting peace and cooperation in the region." added Frithjof Küpper from the Scottish Association for Marine Science.



The Steering Group members and 2 of the project partners after their launch meeting at the Dept. of Biology, University of Athens on March 23: Sotiris Orfanidis, Christos Katsaros, Antonios Zambounis, Frithjof Küpper, Kostas Tsiamis and Panayiotis Panayiotidis.



SAMS scientist Frithjof Küpper inspects the research submersible Thetis of the Hellenic Centre for Marine Research (HCMR), which will be used for exploring deep-water seaweed communities of the Eastern Mediterranean Sea.

CONTACT: Prof. Christos Katsaros -
Christos.Katsaros@biol.uoa.gr
Tel.: +30-210-7274652 / Fax : +30-210-7274702

The Federation of European Microbiological Societies (FEMS): Funding and Other Opportunities for BPS Members



The BPS is a member of FEMS, along with over 45 other scientific societies throughout Europe. At present, it is the only phycological society with FEMS membership. This highly successful federation promotes and supports research, publication, international collaboration, education and awareness-raising. The whole field on microbiology is covered in FEMS' interests, including microalgae and cyanobacteria.

BPS members are eligible to participate in a wide range of FEMS activities including its highly-rated Congresses. Next: 4th FEMS European Congress of European Microbiologists, Geneva, Switzerland, June 25-30, 2011.

FEMS operates a wide range of funding schemes to which BPS members are entitled to apply for support. For information, enter the FEMS website via

www.fems-microbiology.org

Under "Grants and More" you can find information on:

1. FEMS Research and Advanced Fellowships. These are intended to assist young European scientists (below 36 years of age) to pursue short-term projects. The Advanced Fellowships are intended to stimulate and promote longer-term projects at the highest level in Europe's most prestigious laboratories.

The Research Fellowships are for up to 3 months to be pursued in a European country other than that in which the applicant lives. Maximum value: 4000 EUR. Deadlines: December 1st, June 15th.

Advanced Fellowship applicants should have completed their PhD recently and have done less than 3 years of postdoctoral work. Support is provided for 6 to 24 months. Deadline: October 1st.

2. FEMS Meeting Grants. Up to 15000 EUR per grant is available per meeting to support scientific conferences, workshops and training courses (towards support of young scientists and invited speakers).

3. FEMS Meeting Attendance Grants. To contribute towards costs of attending meetings not supported via a FEMS Meeting Grant. Preference is given for European area, but meetings worldwide are eligible for support. Maximum support, 600 EUR; minimum, 250 EUR. Closing dates for applications: April 1st and September 1st.

4. FEMS Visiting Scientist Grants. To support one outstanding European visiting scientist to attend a meeting. Cannot be from the same country as that in which the meeting is held. Maximum 600 EUR; minimum, 250 EUR. Closing dates for applications: December 1st, June 15th.

Geoffrey A. Codd
Chair, BPS Awards and Training Committee



A.J. Brook & Williamson D.B. (2010) *A Monograph on some British Desmids*, Eds. J.H. Price & Evans N.J., London: the Ray Society, ISBN: 0-903874-42-3 978-0-90384-42-7.

As a phytoplankton ecologist for the Scottish Environment Protection Agency, I was extremely interested to learn of an imminent new identification guide to the desmids and furthermore, of one which specifically addressed the British flora. Until now for the classification of desmids we have relied mostly on the rather comprehensive works of West & West (1904, 1905, 1908, 1912), John, Whitton & Brook (2002), and John & Williamson (2009). However, the monograph collated by Brook & Williamson (2010) provides an up to date overview of the British desmids together with invaluable contributions on their taxonomy and phylogeny, which have occurred since the publication of the final volume of the *British Desmidiaceae* (West, West & Carter 1923). Recently, we at SEPA have found a number of apparently new desmids to occur in Scotland's freshwater lochs (unpubl.). Therefore an updated key to the British desmids is welcomed enormously by us, and upon reviewing this book I was not disappointed by its surrounding hype.

The monograph presents itself as an all-inclusive guide to the taxonomic identification and habitat ecology of British desmid genera selected from the subfamily Mesotaenoideae (*Cylindrocystis*, *Netrium*, *Spirotaenia*, *Mesotaenium*, *Roya*, *Tortitaenia*) and the families Peniaceae (*Gonatozygon*, *Genicularia*, *Penium*) and with particular emphasis on the Closteriaceae (*Closterium*). A phyletic-tree based on molecular and pigment evidence describing relationships between families delivers some conflicting evidence compared to the original classification system for desmids which used cell wall characteristics to distinguish taxonomic groupings (Mix 1972, 1975).

Even the specialist eye which appreciates desmids can prove challenging to accurately identify to species level, and themselves often appear variable or polymorphic in form, presumably in response to environmental conditions, which also contributes a degree of uncertainty to their taxonomy. The layout of the monograph is both logically organised and user-friendly. The desmid subfamily and families in this book are addressed in turn, with the provision of a fitting description and straightforward key for distinguishing between the belonging genera. A further detailed overview of the characteristic features of each genus is given along with a relatively simple key to enable possible identification down to species level. Individual keys are complemented with a plate of high quality and intricately detailed species illustrations. These drawings capture the ranging species morphology thus portraying marked variability in the desmids; this is an especially helpful attribute of the book since many other identification guides customarily tend to show the mainstream form. In particular, the work devoted to the *Closterium* species-groups is exceptional and occupies a substantial proportion of the monograph.

Notably, one pitfall is that it lacks a Glossary for technical terms used to describe important morphological characters (e.g. cell shape, etc) meaning those unfamiliar may struggle, but I would refer those to John & Williamson (2009) thus offsetting this oversight.

Although I feel the monograph is aimed at taxonomic experts or at least those with prior experience, I certainly would not discourage the inquisitive amateur from glimpsing at this book, even if only to admire its remarkable illustrations, as it is sure to grow fascination and intrigue for the world of desmids. In summary, this monograph is a first-rate tool for determining the taxonomic identification of British desmids and in my opinion is a highly desirable purchase for fulfilling this purpose. One can only anticipate that in due course, a subsequent monograph or series of follow-up publications of similarly high standard will be produced to embrace the remaining genera of desmids not covered by this book. Essentially bridging the gap in almost a century of gained knowledge concerning the taxonomy, phylogeny and ecology of British desmids, this monograph acts as a fundamental step in this direction.

References

- John, D.M., Whitton, B.A. & Brook, A.J. (2002) *The Freshwater Algal Flora of the British Isles*, 1st Edition, Cambridge University Press.
- John, D.M. & Williamson, D.B. (2009) *A Practical Guide to the Desmids of the West of Ireland*, Martyn Ryan Institute, National University of Ireland, Galway.
- Mix, M. (1972) Die Feinstruktur der Zellwände bei Mesotaeniaceae und Gonatozygaceae mit einer vergleichenden Betrachtung der verschiedenen Wandtypen der Conjugatophyceae und über deren systematischen Wert, *Archiv für Mikrobiologie*, 81, 197 - 220.
- Mix, M. (1975) Die Feinstruktur der Zellwände der Conjugaten und ihre systematische Bedeutung, *Beihfte zur Nova Hedwigia*, 42, 179 - 194.
- West, W. & West, G.S. (1904, 1905, 1908, 1912) *A Monograph on the British Desmidiaceae*, Volumes I - III (inclusive), London: the Ray Society.
- West, W., West, G.S. & Carter, N. (1923) *A Monograph on the British Desmidiaceae*, Volume V, London: the Ray Society.

Pauline Lang
Scottish Environment Protection Agency

seasearch
Guide to
Seaweeds
OF BRITAIN AND IRELAND

British and Irish shallow seas contain an astonishing 7% of the world's seaweed species, around 700 different seaweeds, and yet most divers, snorkellers and rockpoolers can put names to only a handful of them.

This guide aims to de-mystify seaweed identification for the non-specialist. It includes over 200 seaweeds, all of which can be identified in the field, sometimes with the aid of a hand lens.

The book has been produced as part of the Seasearch project, which offers training in identification of marine life and habitats and encourages recording by volunteers. Our aim is to both introduce you to the wealth of seaweeds in our waters, and also to enable you to improve the quantity and quality of the seaweed records we receive.

Features of the book include:

Over 200 species described in detail using photographs and text, with additional information on other groups of seaweeds which cannot be identified to species level in the field

Both scientific and common names for each species and seaweed group

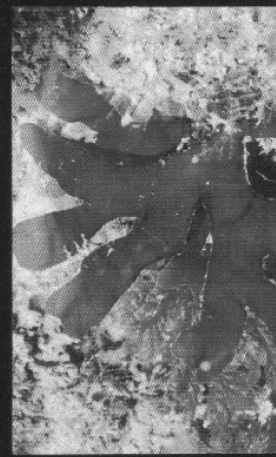
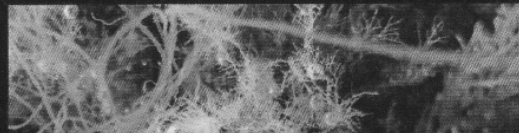
Seaweeds arranged by colour and form to simplify identification

Identification features, size and distribution maps for each species

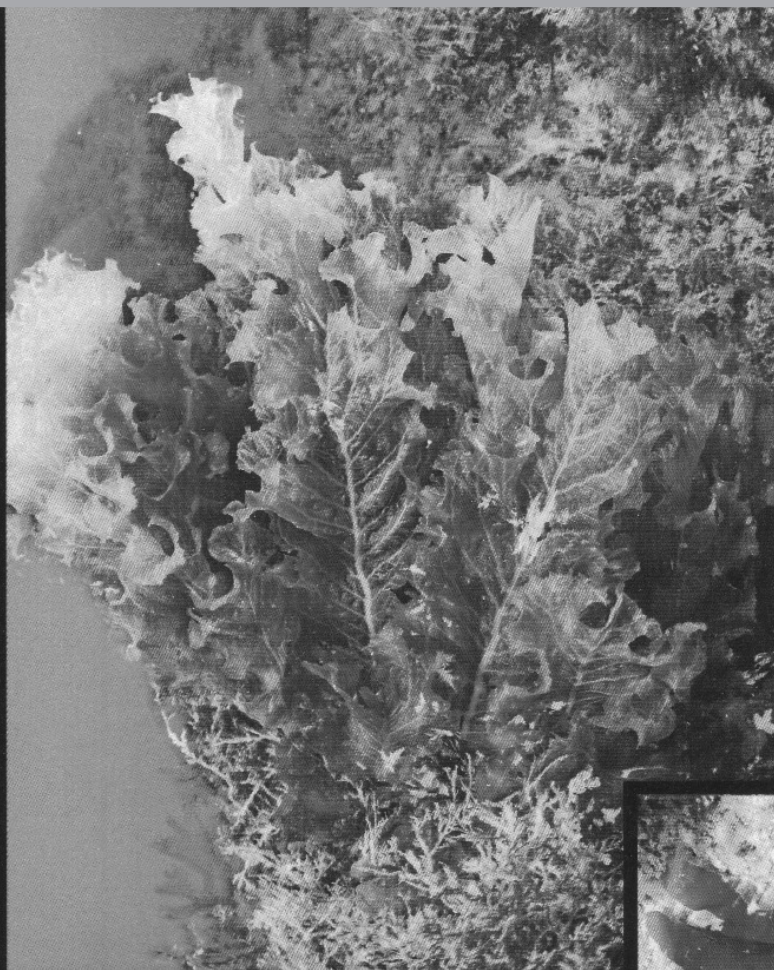
Information on life cycles and collecting seaweeds

The authors, Francis Bunker, Juliet Brodie, Christine Maggs and Anne Bunker are experienced marine biologists and phycologists who have all contributed to the Seasearch project. The photographs in this guide have been taken by a variety of Seasearch divers as well as by the authors.

www.seasearch.org.uk



SEASEARCH GUIDE TO SEAWEEDS OF BRITAIN AND IRELAND



Francis StP. D. Bunker, Juliet A. Brodie,
Christine A. Maggs and Anne R. Bunker

Marine Conservation Society

ISBN 978-0-948150-51-7



9 780948 150517

RRP £16.95



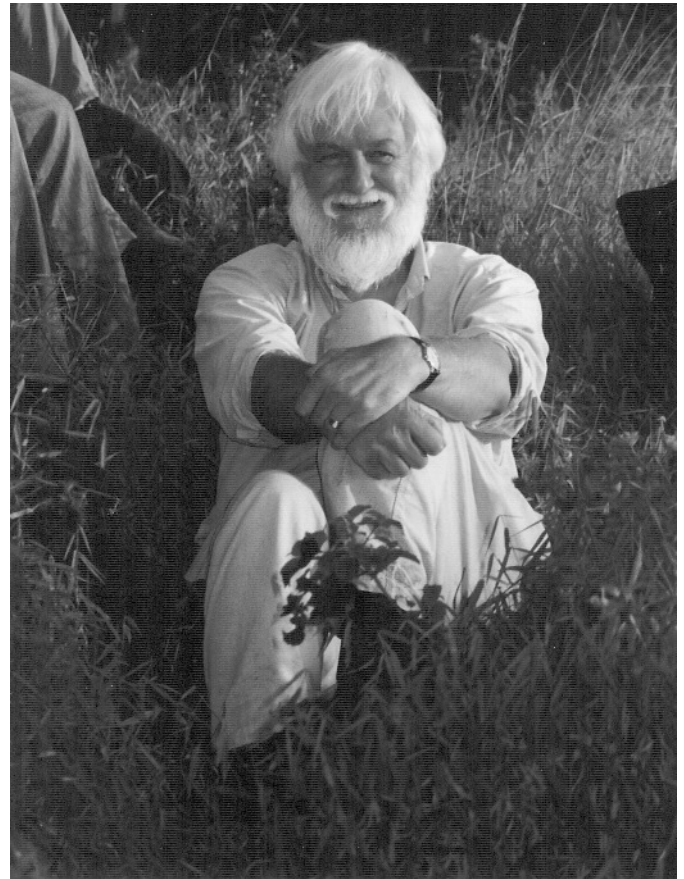
The winter meeting of the BPS scheduled for 2012 is going to be the 60th Anniversary of the Society. To recognise this I hope to run articles from BPS Presidents (past, present and future) in the upcoming issues of *The Phycologist*. In what I hope will be one of many, to kick us off here is the first of such articles. Ed.

Algae and History: Glorious Science and Dismal Politics

As I began to write this, Vince Cable, Minister for Business, was announcing that (now government had bankrupted us by feeding a parasitical financial industry), the research, that will in future be supported, will have to be commercially relevant or of the highest theoretical value. The history of research in phycology (as in all the sciences), over the last sixty years and more, illustrates that such a dirigiste approach is naïve, foolish and wrong.

There was 'commercial' support for work on algae back in the nineteen-sixties when I was stimulated by Frank Round's lectures on limnology, though alas, not so much those on algal structure. Knowledge of algal growth was seen to be relevant to water supply; there was a general understanding that marine primary productivity was somehow relevant to fisheries; but none of it has prevented accelerating problems from eutrophication or overfishing. And few would then have foreseen that slicing obscure flagellates for the electron microscope, and looking at the peculiarities of their scales, was of the highest theoretical value. The money was on biochemistry and its applications, not on a furtherance of the approaches of the Victorian naturalists, who also had classified on structure and appearance.

But not least because of the fierce independence of Irene Manton and other, often female, early members and founders of the Society, this endeavour prospered. It founded a new understanding of algal evolution, and then, combined with the biochemical and ecological synthesis carried out on the blue-green algae from Tony Fogg's labs in London, met up with the geological evidence to help create a story of the Earth's biosphere that has the most profound implications for our future. No longer is the ecology seen to be a dependent of the physics and chemistry of the Earth's surface; now it is clear that the horse is truly in front of the cart. It was the algal evolution of oxygenic photosynthesis, of symbiotic eukaryotic cell structures, of carbonate deposition and silica usage that combined with the visual dullness, but metabolic flair of the bacteria, to produce James Lovelock's concept of the Earth as a system regulated by its ecology. This deep understanding, if only we could



move our politicians' thinking, from the two-centuries-old dismal science of economics to the glorious billennial understanding of where we came from and how, is our best, perhaps only, assurance of a comfortable future for at least a majority of humans and other species.

I doubt Vince Cable really believes in what he is saying, but, when you sell your soul to a political party, truth is the first casualty. Dogma and fashion are what the scientific approach tear apart, and past experience is that it is the curiosity-driven work in areas that are currently obscure that will make for the next shift of paradigm. Somewhere, perhaps in the current plethora of base-sequencing, but maybe not, lies the key to why we seem to have a somewhat suicidal tendency in our approach to the future, and the way to avert it, before the Gaian forces of the algae and bacteria again take matters in hand.

Brian Moss, President, 1997-98

Instructions for Contributors

Copy which is submitted for publication in *The Phycologist* should be concise and informative. Articles should be scientifically sound, as jargon free as possible and written in a readable scientific magazine style. Unless absolutely essential, references should not be included. All types of relevant material will be considered, these include job advertisements, scientific reports, book reviews, news items of topical interest, meeting announcements, grant awards, promotions, appointments, profiles of eminent phycologists and obituaries. If you are interested in submitting material that does not fall within any of these broad categories, or you are unsure of the appropriateness of a potential article, then contact the editor. Suggestions for future articles or a series of articles are welcomed.

Copy should be submitted, preferably as attachments to email or on disc (MS Word for Windows or Rich Text Format). **Illustrations and photos to accompany copy are welcomed and should be supplied in JPEG or TIFF file-format no less than 600 dpi resolution.** The editor reserves the right to edit the material before final publication.

Submission of Copy and Deadlines

Copy should be submitted to:

Dr Jan Krokowski
Scottish Environment Protection Agency,
Redwood Crescent, Peel Park, East Kilbride,
Glasgow G74 5PP
Tel. +44 (0)1355 574200
Fax. +44 (0)1355 574688,
E-mail: jan.krokowski@sepa.org.uk

Deadlines are **March 1st** for the April issue, **September 1st** for the October issue

Typesetting by Agnès Marhadour
Printed by Monument Press, Stirling, UK.

