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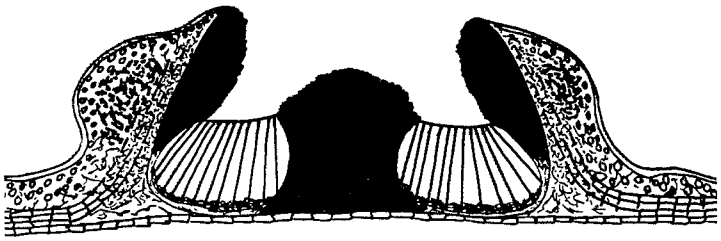

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International Association for Lichenology

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INTERNATIONAL ASSOCIATION FOR LICHENOLOGY

The International Association for Lichenology (IAL) promotes the study and conservation of lichens. It organizes symposia, field trips, and distributes a biannual newsletter. There is a listserver that enables on-line discussion of topics of interest. Webpages devoted to lichenology are also maintained by members of the Association. People wishing to renew their membership or become members of IAL are requested to send their subscription (one payment of 40 USD for 2001-2004) to either Treasurers.

The **International Lichenological Newsletter** is the official publication of IAL. It is issued twice a year (July and December) in English. The *Newsletter* is also available on the Internet. The *Newsletter* is divided into five main sections: 1) **Association news**: official information concerning the Association, such as minutes of Council meetings, proposals of Constitutional changes, new members, changes of addresses, etc. 2) **News**: information about lichenologists, institutional projects, herbaria, requests of collaboration, announcements of meetings, book reviews, etc. 3) **Reports**: reports of past activities, short lectures, obituaries, short historical novelties, etc. 4) **Reviews**: presentation of recent progress and other topics of interest in lichenology with optional discussion. When the material exceeds the available space, the Editor will prepare a summary, on prior agreement with the contributors. 5) **Lichenology on-line**: information on Web sites devoted to lichens. Any information intended for publication should reach the Editor on or before June 15 and November 15 for inclusion in the July and December issues, respectively.

IAL affairs are directed by an Executive Council elected during the last General Meeting. Council members elected at the IAL4 Symposium (Barcelona, Spain, 2000) are listed below, and will serve until 2004.

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ASSOCIATION NEWS

Acharius Medal given to Sir David Smith at the Symbiosis Congress 2003 in Halifax

Professor Sir David Smith is well known to symbiosis researchers for his elegant studies and lucid papers on the physiology of algal symbioses with lichen-forming fungi or with marine and freshwater invertebrates such as green hydra, corals, molluscs and flatworms. These truly interdisciplinary studies were conducted in search of common functional principles. David Smith has shaped our thinking about symbiosis in general and the lichen symbiosis in particular. He has co-authored the influential *Biology of Symbiosis* (with Angela E. Douglas), and co-edited five books, including *Cell to cell signals in plant, animal and microbial symbiosis*. In inumerable review articles, book chapters, and in especially well presented lectures David Smith clearly illustrated the peculiarities of lichen symbiosis to both lichenologists and non-lichenologists. Unforgettable to all attendants, and in its published form an obligate read for all lichenologists, is his delightful 1978 General Lecture entitled "What can lichens tell us about real fungi?" (Smith 1978), held at IMC2 in Tampa.

Beginning with his doctoral thesis in the laboratory of Prof. Jack Harley, leading expert on mycorrhizal symbiosis at Oxford University, David Smith focused on the centerpiece of lichen symbiosis, the exchange of water and nutrients between the symbionts. As a young postdoc he then adapted the newly available radioactive tracer technique to the lichen symbiosis and developed the so-called *isotope trapping* or *inhibition technique*, which was later successfully applied by a whole generation of lichen physiologists. Through his efforts, the centrally important role of sugar alcohols in lichen symbiosis was recognised. Numerous talented students and co-workers joined David Smith's team at Oxford, later at Bristol and again Oxford University. The result was an impressive series of publications on the physiology of lichen symbiosis. Many of his former students became distinguished in their own right, notably Prof. David Richardson and Prof. Allan Green (both experimental lichenologists), Dr. Angela Douglas and others.

David Smith was founding member of the British Lichen Society and served as its president. He also presided over numerous other scientific societies and committees, and he is currently the president of The Linnean Society and a trustee of World Wide Fund for Nature UK. In addition to his scientific accomplishments, David Smith's modesty, generosity and beautiful humour and his talent for leadership have earned him great respect throughout the academic world. Because of his interest in all aspects of academic life and willingness to apply his expertise and reputation to create the best possible environment for other scientists, David Smith accepted an appointment as Principal and Vice Chancellor of Edinburgh University. One of his outstanding virtues is to speak up for those who tend to get swept to the margins or beyond by mainstream waves in science or educational systems: lichenologists among mycologists (also at IMC2), taxonomists among experimental biologists, science teachers in re-structured educational systems, and so on.

In recognition of the many accomplishments, David Smith has received honorary degrees from eleven universities in Great Britain and North America. In 1986 he was

conferred a knighthood for his innovative scientific work and his tireless efforts on behalf of British science. His pioneering work in experimental lichenology, his interdisciplinarity and support of younger colleagues make him a deserving recipient of the Acharius Medal.

Reference

Smith, D.C. (1978) What can lichens tell us about real fungi?. Mycologia 70: 915-934.

Rosmarie Honegger, Zürich

News from IAL5, Tartu (Estonia), 16-21 August 2004

The distribution of the Second Circular is planned by November 2003. It will contain the full set of information, including prices. Preliminary registration will last until the end of September 2003. All persons who have registrated already will get the Second Circular by post. Note that a field trip in association with IAL5 to Russia is announced separately (see below). An additional workshop has been included in the scientific program, and is presented in the following contribution.

Tiina Randlane, Tartu

Workshop at the IAL5: Translation of phylogenetic analyses into classification

The translation of the results of phylogenetic analyses into a classification is a major problem of current systematic research. With the availability of molecular data this has become more acute than previously. The problem is especially acute at the generic level, due to the nature of the binominal name system. Numerous users of classifications, but also traditional taxonomists look critically at the results of molecular studies and nomenclatural changes caused by these. There are different possibilities of the translation into nomenclature, such as ignoring these data, accepting paraphyletic assemblages, changing the names after each analyses, etc. Each of these possibilities has its own problems. The discussion of this topic was partly covered by a previous discussion in the IAL newsletter, without clear resolution of the problem. Subsequently - in a publication in Nature - it was argued that several taxonomies might be accepted, e.g. a separate one by the name users. However the reluctance to accept new evidence for phylogenetic relationship may result in even more complications.

Several questions will be discussed during this workshop, including:

1) Shall lichenologists overcome well-accepted classifications, when they are contradicted consistently by molecular data?
2) How many data are required to accept molecular evidence for the rejection of traditional classifications?
3) In the particular cases where monophyletic genera are nested within a larger genus, should the former be lumped in the latter or should the monophyletic groups be expanded to include parts of the larger genera?
4) How would lichenological taxonomy deal with monophyletic groups that cannot be circumscribed by phenotypic characters?

These questions will be dealt within two more general talks on the problem and two case studies of groups of lichens in which the classification problem is acute. The main part of the workshop will then be a discussion on the problems.

H. Thorsten Lumbsch, Chicago

Lichenological Field Trip to Russia prior to the IAL5 in Tartu, 2004

On behalf of Russian lichenologists we are pleased to invite the participants of IAL5 in August 2004 to naturally and culturally interesting sites in North-West Russia close to Estonia. In association with the IAL5 meeting in Tartu, we are planning to organize a five-day trip to the northern shore of Lake Ladoga (Republic of Karelia and St. Petersburg region) with a one-day stop in the city of St. Petersburg that just celebrated its 300th anniversary.

The trip is scheduled for August 10-15, 2004. It will include boat trips to the islands in the skerries of Lake Ladoga and Valaam archipelago, bus excursions to calcareous outcrops, various forest types and grasslands along the coast of Lake Ladoga, as well as sightseeing in St. Petersburg and a stop at the Komarov Botanical Institute (herbarium LE).

Further details about the field trip and pre-registration form can be found at the web-page of St. Petersburg Naturalists Society at **www.teia.ru/ecology/fieldtrip.htm**

Alexei Zavarzin, Angella Sonina, Margarita Fadeeva, Mikhail Zurbenko, St. Petersburg

IAL Council 2004-2008: Call for Nominations

This announcement calls for nominations for the next IAL Council. Any member of the IAL may submit nominations or be nominated. Nominations, to be valid, need the written consent of the nominees, and need to reach the Nominating Committee at least two months prior to the General Meeting in Tartu, Estonia. Please indicate which function your suggested future council member shall have. A nomination committee is currently formed to handle the proposals. Please send your suggestion for the next IAL council to a member of the nomination committee of IAL: Peter Crittenden (*peter.crittenden@nottingham.ac.uk*), Helmut Mayrhofer (*helmut.mayrhofer@uni-graz.at*), or Bruce McCune (*bruce.mccune@science.oregonstate.edu*).

Helmut Mayrhofer, Graz

Call for nominations for the Mason Hale Award and Acharius Medal in 2004

An Acharius Medal and a Mason Hale Award will be presented at the IAL5 General Meeting in Tartu.

The **Acharius Medal** recognizes the life-work of distinguished lichenologists. Nominations should be sent to the Secretary of IAL by e-mail (*sancholg@eucmax.sim.ucm.es*) before January 31, 2004. They must contain: a) name and address of the proponent, b) name and address of the nominee, and c) a brief description of the life-work of the nominee.

The **Mason Hale Award** honours excellence in research and outstanding work resulting from doctoral dissertations by young lichenologists. Nominations of completed theses, finished after the last General Meeting in Barcelona should be sent by mail to the Secretary of IAL (Leo G. Sancho, Dept.o de Biologia Vegetal II, Facultad de Farmacia, Universidad Complutense, 28040 Madrid, Spain) before January 31, 2004. They must contain: a) name and address of the proponent, B) name and address of the nominee (different from the proponent), c) a brief outline of the research work of the nominee, including some notes on her/his curriculum, and d) a copy of her/his dissertation.

Call for the organization of IAL6 in 2008

The next General Meeting after Tartu is IAL6 and will take place in 2008. Those who are willing to organize the IAL6 meeting are invited to submit their suggestion to the Secretary of IAL (*sancholg@eucmax.sim.ucm.es*) prior to the General Meeting in Tartu, Estonia.

IAL and the IBC17 in Vienna, 18-23 July 2005

IAL strongly encourages lichenologists to present symposia at the International Botanical Congress in Vienna. The deadline for symposium proposals is the end of September, 2003. More information is available from the website of the Congress: **www.ibc2005.ac.at**. Any suggestions for lichenological topics may be sent to the Secretary of IAL (*sancholg@eucmax.sim.ucm.es*). The IAL Council will review the suggestions and nominate some official proposals in the name of the whole lichenological community to the organizers of the Vienna Congress.

The Editor

NEWS

Field meeting in Finland, 12-14 September 2003

A combined field meeting and minisymposia of Finnish lichenologists and bryologists has been arranged from September 12-14, 2003 in Parikkala, SE Finland, along the Russian border. The area is a little studied Finnish part of the traditional floristic province Karelia ladogensis. Contact: *kimmo.syrjanen@ymparisto.fi*

Teuvo Ahti, Helsinki

Reprints in Essen

The Botanical Institute in Essen still has a lot of reprints by G.B. Feige and coworkers. Reprints to the Exsiccates (Umbilicariaceae and Lecanoroid lichens) and past issues of Aktuelle Lichenologische Mitteilungen (ALM) are available, too. For further information contact *benno.feige@uni-essen.de*. A compendium of the reprints is available on the internet at **www.uni-essen.de/botanik/pubbot.htm**. Depending on the quantity requested, you will be asked for a donation to the SOS-Kinderdörfer (Note by the Editor: an international organization to provide homes for children who have lost their parents).
The lichen herbarium at the university of Essen (ESS, Sammlung G.B. Feige) and the literature will be transferred to the Botanisches Institut of the University of Halle in late 2003. From that date, the herbarium (c. 25,000 specimens) and the literature (mainly on lichens, about 15,000 reprints) will be handled by Dr. Regine Stordeur.

G.B. Feige, Essen

Personalia

Ted Ahti (Helsinki) reports that all the cryptogamic collections of the Botanical Museum in Helsinki (H) have been moved to be co-located with the phanerogamic herbarium at the old address (Unioninkatu 44) in the city centre. The new postal address is: Botanical Museum, P.O. Box 7, FIN-00014 Helsinki University, Finland. The old building has been renovated and an additional wing will be constructed. New arrangements in the herbarium will be necessary for months, but most of the collections are already available for visitors. The recent report on the accessions of the Botanical Museum in 2001 (Uotila *et al.*, Memoranda Soc. Fauna Fl. Fenn. 78: 63-66. 2002) gives an official figure for the number of lichenized fungal specimens in H: 375,167. However, large backlogs and recent accessions have not been included. - Ted's office moved from the Department of Ecology and Systematics to the Botanical Museum at the same time (see address changes).

Eduard Bajbakov from Kazan state university (Kazan, Tatarstan Republic, Russia) finished his thesis evaluating urbanized territories using lichens as indicators. He analyzed changes in the Kazan lichen flora over the last century and tested several approaches indicating environmental quality using lichens with special focus on the effect of traffic on

epiphytic lichen communities. The work is available only in Russian, but those who are interested may contact Dr. Bajbakov by e-mail: *eduard.baibakov@ksu.ru.*

Svetlana Voronjuk defended her thesis, devoted to the inventory of lichens in eastern Sajany mountain foothills (Irkutsk region, Siberia). Her study was performed by under the supervision of **Tatyana Makry**, Central Siberian Botanical Garden (Novosibirsk, Russia). This first inventory of lichens in that area resulted in a list of 350 species including an analysis of taxonomic composition and ecological preferences. Available only in Russian, for more information contact Dr. Voronjuk by e-mail: *sokolov@irmail.ru* (att. S. Voronjuk).

Dorothee Killmann and **Eberhard Fischer**, University of Koblenz (Germany), are currently studying the lichen flora of East African montane rainforests with special focus on Rwanda. During a field trip in March 2003 about 1000 samples were collected in Nyungwe forest and the Virunga volcanoes. At Koblenz, about 2000 lichen specimens from both Kenya and Rwanda are housed. A subproject will deal with the influence of anthropogenic and natural habitat fragmentation on lichen diversity in the Nyungwe forest, the Virunga volcanoes and the Akagera National Park. Colleagues who are interested in helping with identification are welcome and invited to contact D. Killmann (*killmann@uni-koblenz.de*). More details about our lichen projects can be found on the website **www\html\fischer\f_9.html**

Martin Kukwa (Gdansk) finished his PhD thesis 'The lichen genus *Lepraria* in Poland'. Descriptions based on his own studies, chemistry, habitat requirements, distribution in Poland, general distribution and revised specimens of each taxon are included. He plans to publish the work by next winter.

Lucyna Sliwa (Krakow, Poland) accepted a position as a senior scientist in the Laboratory of Lichenology of W. Szafer Institute of Botany (Polish Academy of Sciences, Krakow) after working as an academic at the Jagiellonian University for 10 years. She joined the team of Urszula Bielczyk and Beata Krzewicka. Lucyna is currently working on the manuscript summarizing the results of her investigations of the *Lecanora dispersa* group in North America.

Address changes

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New Literature

THOMSON, J. W. 2003. Lichens of Wisconsin. Wisconsin State Herbarium. 386 pp. Spiral bound. ISBN 0-9727393-0-0. Price $22 + shipping.

The year I was born (1944) John Thomson started teaching at the University of Wisconsin-Madison, although he had published his first lichen paper 10 years earlier. Since then John has been collecting throughout the state, slowly collecting specimens and compiling records. After all the other lichenological work he has done, which need not be repeated here, he has ultimately pulled together all his lichen work in Wisconsin in this publication. I have used his maps and keys for years in his office, and now they are in print for everyone to use. The preface of this book contains an interesting history of this endeavor.

The book contains keys, brief taxonomic descriptions, habitat and geography information, and maps of every taxon, for a total of 148 genera and 615 species. The layout is easy to read and use. The keys are alternate indented, and back-referenced. The photobiont is listed for many taxa, and a reference is given for more information. Spore measurements and chemical tests are provided for most taxa, in addition to a page number and reference (either to *North American Lichens* or one of Thomson's earlier books) for an illustration of the taxon, there being no illustrations in the book. There is also a brief glossary, 17 pages of references and an index, followed by an appendix of new state and county records resulting from the 2002 Tuckerman Workshop in northern Wisconsin. The book is paperback and spiral bound, so it lies flat on the bench while you are working on specimens, a nice feature. It is well worth the reasonable price.

John was not funded to do the lichens of Wisconsin, so he was only able to collect when he was in the field for other reasons. Consequently, there are parts of the state that are under-represented, and recent collecting in some of those areas have discovered even more county and state records than are in the appendix. Thus, the book may underestimate the total lichen flora of the state by another 40-50 species. Hopefully the book will inspire future botanists to fill these gaps.

James P. Bennett, Madison

STAIGER, B. 2002. Die Flechtenfamilie *Graphidaceae*. Studien in Richtung einer natürlicheren Gliederung [in German, with keys in German and English]. *Bibliotheca Lichenologica* 85, 526 pp., 203 figures, 5 tables, 11 photographic plates. J. Cramer in der Gebrüder Borntraeger Verlagsbuchhandlung, Berlin-Stuttgart. ISBN 3-443-58064-5. Price: EUR 128.- (US$ 140.-). Web page: **www.schweizerbart.de/pubs/books/bo/bibliothec-058008500-desc.html.**

Zahlbruckner is finally outdated! No longer will you label your graphids, based on ascospore types, as *Graphis* aff. *scripta* or *Phaeographis* sp. A. No more frustration about closely related species in different genera, due to their spore types.

The late Mason Hale had long recognized the inappropriateness of Zahlbruckner's ascospore concept, but found it premature to come up with an alternative solution. The concept now presented by Staiger is indeed revolutionary. Although *Graphis*, *Phaeographis* and *Phaeographina* still exist, these genera are no longer what they used to be. *Graphis* now comprises species with a carbonized excipulum and hyaline, both transversally septate and muriform ascospores, while *Phaeographis* unites taxa with non-carbonized excipula and brownish, transversally septate or muriform ascospores. In

addition, no less than 16 genera, described more than a century ago and long forgotten by most lichenologists, have been reinstated, and two further genera are newly established. You will have to get used to names like *Acanthothecis*, *Anomalographis*, *Anomomorpha*, *Carbacanthographis*, *Diorygma*, *Dyplolabia*, *Fissurina*, *Glaucinaria*, *Gymnographa* (= *Sarcographina*), *Gymnographopsis*, *Hemithecium*, *Leiorreuma*, *Platygramme*, *Platythecium*, *Solenographa* (= *Cyclographina*), *Thalloloma*, and *Thecaria*. And this is not even an exhaustive list of all available names in the family; indeed, no less than 37 further names have been placed into synonymy! It is hard to believe that in a group in which lichenologists chiefly used just seven genera in the recent past, more than 50 had actually been described and about 70(!) had been included in the family at one point or another.

For many lichenologists, these changes will be drastic and hard to digest. I myself have always been reluctant in accepting generic redispositions, especially when dealing with the dissection of huge but natural 'megagenera', such as *Parmelia* and *Porina*. However, Staiger's treatment of *Graphidaceae* is different because it terminates an artificial arrangement already accepted for too long. As such, she has cut the 'Gordian Knot' (as Dick Harris would say), and the impact on the systematics of tropical microlichens cannot be estimated high enough. This work might indeed be compared to Hafellner's pioneering paper on ascus structures in *Lecideaceae* and *Lecanoraceae* from nearly 20 years ago, and it is certainly no coincidence that both have a very similar title. Staiger's thesis is not a thorough taxonomic monograph, it is, in the first place, a working document, and presents a huge amount of new ideas in a very concise form. Only representative species are included for most genera, and some genera are only treated by their types and not discussed any further, with reference to forthcoming publications. Keys to selected species are presented for most, but not all genera (in German and English). Genus and species descriptions are accompanied by line drawings of ascoma sections and ascospores and excellent habit photographs (including one colour plate). While comparative discussions are exhaustive for many of the genera and useful to understand their differences, taxonomic relationships of individual species are only rarely discussed, and notes are often restricted to nomenclatural issues, so one has to rely on the keys to extract specific characters. This book is therefore chiefly addressed to experienced lichenologists rather than beginners, and parallel use of Hale's and other alpha-taxonomic treatments is helpful. As a matter of fact, with Staiger's thesis at hand and accompanied by the aforementioned papers, I was able to identify more than 200 samples of *Graphidaceae* from Costa Rica and Brazil to genus and most of them even to species level!

The taxonomic concept applied by Staiger, chiefly based on excipular structures and supported by ascomata morphology, hamathecium structure, ascospore type, and secondary chemistry, is convincing and matches related groups in the Ostropales. Salisbury and Hale were the first to propose a generic concept based on excipular structures in *Thelotremataceae*, and also in the *Asterothyriaceae*, *Gomphillaceae* and non-lichenized *Stictidaceae*, the structure of the apothecial margin has long been the foremost character to distinguish between genera. It therefore seems amazing that it took so long to apply this concept in *Graphidaceae*. Hymenial inspersion has not been used before but turns out to be an important feature to characterize certain genera or species. Hale described striate labia in detail, but to my knowledge, Staiger is the first to explain this phenonemon by periodical renewal of hymenia and repeated formation of new excipula from old hymenia. Having done so, however, the question arises how important this character can be to separate species groups or species, since even in a 'striate' species, the first, non-striate generation of apothecia will produce mature ascospores. It is also clear that, although Staiger's concept is very convincing, it might not be the final solution. Some

closely related groups now separated in different genera might be reunited in the future, while others might even be further divided. DNA studies will certainly help to validate Staiger's findings, and the results of detailed molecular analyses are indeed to be expected soon from her and her colleagues.

Kalb's Lichenological Institute has been one of the few groups with a constant output of students tackling the systematics and taxonomy of tropical microlichens. New and controversial ideas are often presented in unconventional ways and are not always easy to digest in an environment where one gets used to see molecular phylograms all over the place. One could say that this is 'old school lichenology'. Indeed, it is, but this is first class old school lichenology! Staiger's thesis shows a talent for morphological details that is nowadays often missing in young lichenologists too easily attracted by molecular approaches. Cladistic techniques can be learned and practiced, but the eye for the detail, and the taxonomic intuition (which is not a 'feeling' but the ability to see patterns without needing a computer to analyse them), are gifts that you either have or not. Bettina Staiger has these gifts and is certainly one of the most promising young lichenologist now emerging. And her thesis belongs in the bookshelf of every serious lichenologist. This is a splendid work, and its publication demonstrates a lot of courage!

Now here comes the other side of the coin... Be prepared to pay almost 140$, plus costs for shipping and handling and maybe customs, to get a copy. I really wonder how such a price can be justified, since manuscripts are provided in camera-ready format and there is little work left for the publisher other than printing and binding. Of course the series is produced on high quality paper and solidly bound, but does this justify such a high cost? Although the target group is certainly different, many will be reluctant to pay 140$ for this book when they can have the 'Lichens of North America', with 795 pages including nearly 1000 beautiful and high-quality colour photographs, for 50$. Publishers, please consider that students all over the world will need Staiger's thesis, but they will not be able to afford it, and as a consequence, illegal copies are unavoidable. This cannot be in anybody's interest.

Robert Lücking, Chicago

BYAZROV, L.G. 2002. Lichens in ecological monitoring. Scientific World, Moscow. 336 pp., 22 figures, 40 tables (in Russian). Price: 5 EURO + 1 EURO for postage.
This book is the first compilation of this kind ever published in Russian. It is based on the results of the long-term investigations performed by the author, and on the analysis of published data about lichen biomonitoring all over the world. The books bibliography contains over 1100 cited works and is a combination of a profound review, useful textbook and valuable manual for practical use. A substantial part of it is devoted to different methods of monitoring with lichens including informative examples. A special chapter describes the effects of radiation, focusing on the studies in Chernobyl area and the surroundings of the Semipalatinsk nuclear testing site. The monograph can be ordered from the publisher (e-mail: *naumir@ben.irex.ru*).

Alexei Zavarzin, St. Petersburg

MALYSHEVA, N.V. 2003. Lichens of St. Petersburg 2. Transactions of St. Petersburg Naturalists Society, Ser. 2. St. Petersburg University Press, St. Petersburg. 192 pp. (in Russian with English summary). Price: 10 EURO +1 EURO for postage.

The monograph of Dr. Natalia Malysheva is dedicated to the results of her long-term investigations of the lichen diversity of the city of St. Petersburg and it's suburbs. This work is also based on the analysis of available publications and collections including those from the XVIII-th century and gives a very good overview of the historical dynamics and present state of the lichen flora of one of the largest cities of Russia. The book can be ordered from St. Petersburg University Press (Universitetskaya emb., 7/9, St. Petersburg 199034, Russia or by e-mail *books@dk2478.spb.edu*) or from St. Petersburg Naturalists Society using e-mail: *secret@sn.pu.ru*

Alexei Zavarzin, St. Petersburg

BIELCZYK, U., CIESLINKI, S. & FALTYNOWICZ, W: (eds) 2002. Atlas of the Geographical Distribution of Lichens in Poland, Part 3. Published, sold and distributed by: W. Szafer Institute of Botany, Polish Academy of Sciences, Lubicz 46, 31-512 Kraków, Poland. 114 pp. ISBN 83-85444-93-9. Price unknown.

This third volume in the new series of the Polish lichen atlas treats the following 20 species: *Acarospora glaucocarpa*, *A. macrospora*, *Anema decipiens*, *Caloplaca herbidella*, *Catillaria lenticularis*, *Cyphelium inquinans*, *Diploschistes gypsaceus*, *Fuscopannaria leucophaea*, *Micarea melaena*, *Nephroma expallidum*, *Pannaria pezizoides*, *Peccania coralloides*, *Psorotichia schaereri*, *Rinodina bischoffii*, *R. immersa*, *Solorina saccata*, *Umbilicaria hirsuta*, *U. hyperborea*, *U. nylanderiana* and *U. vellea*. For every species a map is presented, in which localities in the periods before 1900, 1900-1960 and after 1960 are distinguished. In two or more accompanying pages of text (English and Polish) further information on the species is given: a short characterization, habitat preferences, changes in distribution and conservation status, and an extensive list of literature. The maps clearly reflect the intense lichenological activity in Poland in recent decades, most dots are 'after 1960'. Many lichen species appear to be restricted to the southern mountains, in particular the chain along the border with the Czech Republic and Slovakia. Most species seem to be still present in the same range as before 1900, though the Pannariaceae, in particular, seem to have become much rarer. The last pages contain an alphabetical list of all ca. 140 lichen species treated so far in the Atlas.

Harrie Sipman, Berlin

UMAÑA, L. & SIPMAN, H. 2002. Líquenes de Costa Rica. (In English and Spanish.)Produced by INBio (Instituto Nacional de Biodiversidad), Santo Domingo de Heredia, Costa Rica. 156 pp. ISBN 9908-702-74-9. Available from **www.inbio.ac.cr/editorial**, Price US$ 12.

Ecotourism is an important source of income for Costa Rica, and this booklet wants to support this way of sustainable use of the country's biodiversity. It is directed to tourists who want to know more about the lichens they see in the country. 54 species are treated, mainly macrolichens, each illustrated by a color photograph and with a short text containing a description and notes on habitat and distribution. In addition, there are a general introduction on lichens illustrated with pencil drawings, a glossary and a bibliography. The selection of the treated species depended much on the availability of photographs, though macrolichens from roadside habitats, such as tourists are more likely to encounter, predominate. The quality of the photographs may not be as good as those by Sharnoff and Wirth. Many are from herbarium specimens and some have become unnaturally tinged in the printing process. Still it will be possible to recognize several of the common lichens in the mountains of Costa Rica from these pictures.

The Editor

REPORTS

Reports from local lichenological societies

Members of the **California Lichen Society** (CALS) have engaged in many activities this year in their efforts to learn more about California's diverse lichen flora. Nine field trips to points of interests from Shasta County in the north, south to Point Loma in San Diego, and from the coast to the Eastern Sierra Nevada Mountains have either occurred or are planned for the coming months. Interspersed between these outings, many members have participated in workshops at various locations in the state, some on a regular schedule.

At Point Loma CALS member Andrew Pigniolo found a *Trichoramalina crinita*, a lichen not reported on the mainland of California since Hasse collected it there in 1909. Charis Bratt of the Santa Barbara Botanic Garden had found it in Baja California, Mexico, and on most of the Channel Islands, off the coast of California, but not on the mainland. The small thallus of *T. crinita* with its noticeable black cilia is pictured on the cover of the current Bulletin of the Society.

Janet Doell, Fairfax

The web site of the **Italian Lichen Society** has added some statistics about the society members, which can be found following the menu links through "presentazione" and "statistiche" (**dbiodbs.univ.trieste.it/sli/home.html**). Since 1987, when the Italian Lichen Society (SLI) was formed, the number of members increased more than 20-fold, passing from 20 to 429 (last updated May 31, 2003). The majority are ordinary members (345), while students are 49, collective members 10 and honorary members (see the menu link "albo d'onore" for a list) 23. From 1988 to 2002 the number of new members per year ranged between 9 and 31, while in the first 5 months of 2003 the new members are already 122.

This huge increase is related to the "resurrection" of the working groups (see the link "gruppi di lavoro") within the society. At present there are 5 working groups: 1) Biology, 2) Biomonitoring, 3) Didactics, 4) Ecology and Vegetation, and 5) Floristics and Systematics. The working groups are very active, organizing field excursions (the last one took place at mid-April in the National Park of the Maddalena Archipelago, Sardinia; see the menu link "Floristica e Sistematica" for a gallery of pictures of participants and landscapes), and workshops (an important one with about 120 participants was organized in Torino at the beginning of April by the working group for Biomonitoring; see the menu link "biomonitoraggio").

For this year the SLI is organizing the 16th annual congress, which will take place in Florence in September, 18-19, 2003 (see menu links "iniziative", "convegni", "convegno 2003"). At the moment the web site is only in Italian but an English version will be

available soon. For any question or further details, please contact the Secretary, Stefano Loppi (*loppi@unisi.it*)

Stefano Loppi, Siena

Report from 10th Field Spring Meeting of the Bryological-Lichenological Section of the Czech Botanical Society, 24-27 April 2003

The 10th Spring Field Meeting of the Bryological – Lichenological group took place in Krásná Lipa, a small town situated near the recently formed National Park of Bohemian Switzerland in the Czech Republic. Most of the participants came from the Czech Republic, but guests from Germany and Poland were also invited. Participants were hosted in Krásna Lipá in two places: in the seat of the Czech Union of Nature Conservationists and in the seat of the National Park of Bohemian Switzerland Administration.

Because of the large number of participants several excursions into smaller groups were carried out each day (three bryological and one lichenological team). The excursions began at 8.30 a.m. when the groups drove to their sites by car. In the evening on 26th of April we listened to a talk by Ewa Fudali from the Department of Botany and Plant Physiology from the Wrocław Agricultural University (Poland) on „Some open questions of urban bryophytes and the problem of their bioindicative application".

The National Park of Bohemian Switzerland was opened on 1st January 2000 and is situated at the border of Czech Republik and Germany. The Elbe River canyon, the biggest sandstone canyon in Europe, and the steep sandstone rock towers, up to one hundred meters in height, form an impressive landscape. Lots of former volcanic peaks covered completely by trees makes the countryside even more spectacular.

The National Park of Bohemian Switzerland has not been studied lichenologically so far. Macrolichens are poorly represented in the area because of air pollution and only small clusters of *Sterocaulon* and *Cladonia* were usually present. The area was richer in crustose lichens, and *Lecanora* and *Micarea* species were more common.

Magdalena Opanowicz, Gdansk

Ticolichen field trip 2003

Robert Lücking, Harrie Sipman, Martin Grube, William Buck, Susan Will-Wolf, Marie Trest and Matthew Nelsen participated at the second TICOLICHEN foray to Costa Rica in March/April 2003. Together with Loengrin Umaña, José Luis Chaves (parataxonomist), and Daniela Lizano, student at the University of Costa Rica, they visited more than 20 different localities, ranging from lowland rainforest to paramo. All together, they collected some 5,000 specimens (including duplicates), and most have been already mounted, identified to genus level, and databased during a subsequent workshop at INBio. Screening of the material resulted in an estimated total of 500 species, with many further new records for Costa Rica and a set of potentially new taxa. The most spectacular new record is a new species in the genus *Dictyonema* with smooth lobes and isidioid outgrowths. No new species has been described in this genus since it was monographed 25 years ago by Parmasto. We also found several fertile crustose forms in that genus which so far are believed to be growth forms of the widespread *D. sericeum* but which most probably represent autonomous species. Bill Buck (New York Botanical Garden) was very successful in collecting rare lichens growing on bryophytes and humus, by crawling for

hours with his lens on the ground. Martin Grube (Graz) added a numerous amount of Arthoniaceae and other interesting crustose taxa to our collections. As invited specialists, Jolanta Miadlikowska and François Lutzoni from Duke University spent five days collecting Peltigeraceae and specimens for the ongoing AFTOL project.

Robert Lücking, Chicago

REVIEWS

Recent Literature on lichens (Culberson† et al. 2003) and Mattick's Literature Index (Sipman 2002) are compilations of recent and old literature in lichenology. As such they are services of major importance to the lichenological community. Previously available as hard copy publication or as card index, Recent Literature on Lichens (since 1997) and Mattick's Literature Index (since 2001) can now freely be accessed via the internet at **www.toyen.uio.no/botanisk/lav/rll/rll.htm**. Mattick's index originally covered the period 1875-1950, but the database records now reach back to 1536. With the query page it is possible to search for authors, dates, keywords, etc. The compilation of the Recent Literature on Lichens database was iniciated by the late William 'Bill' Culberson, and subsequently continued by Robert Egan and Ted Esslinger. In the following article Robert Egan provides a more personal account on his involvement in the evolution of the database.

References

Culberson, W.L., Egan, R.S. & Esslinger, T.L. 2003. Recent Literature on lichens. http://www.nhm.uio.no/botanisk/bot-mus/lav/sok_rll.htm. [Presented on the Web by E. Timdal. First posted 1997.04.14, latest update 2003.06.27]

Sipman, H. 2002. Mattick's Literature Index. http://nhm.uio.no/botanisk/lav/rll/mattick.htm. [Presented on the Web by E. Timdal. First posted 2001.06.12, latest update 2002.06.18]

The Editor

A History of the Recent Literature on Lichens project: The Middle Years 1979-1991

During the years I was a graduate student at the University of Colorado under Sam Shushan (1967-1971), I realized the exceptional importance of the "Recent Literature on Lichens" lists produced by Bill Culberson for nearly every issue of *The Bryologist*. About 1969 I first began to make and accumulate 3x5 index cards for each of these references by photocopying the lists, cutting the pages into strips, and pasting (or taping) them onto cards. Since many references contained only a horizontal line and lacked the authors names, I typed the authors names and publication date at the top of the cards and filed them alphabetically in metal file drawers. I made some feeble attempt at creating subject categories but never had time to finish the project, although I did note on cards if I had a

particular article in my library. After completing my Ph.D. I had hundreds and hundreds of cards.

The next 8 years were spent at Castleton State College, Vermont, and Texas A&M University in College Station, Texas. I continued to make cards (or get a secretary to type and or paste references) for each list as it appeared in *The Bryologist*. I still longed to "categorize" references by subject areas, but the magnitude of the task was far beyond my available time. The card files had grown to take up MANY file drawers.

During the summer of 1976, I received a letter form Bill Culberson inquiring if I might be interested and willing to assume the authorship of the Recent Literature on Lichens series. I enthusiastically accepted the offer, and we began to work toward the changeover for my authorship of list 101. Bill and Chicita, besides having access to a wonderful botanical library at Duke and reprints from colleagues around the world, subscribed to a weekly literature search done by ISI, the publishers of *Current Contents*. Bill kindly offered to supply me with these reference printouts after I assumed production of the lists. These were an enormous help over the years in providing citations to locate and abstract for inclusion in the annotated lists. List 101 appeared in volume 82, number 1 in the spring of 1979. I made a few minor changes in format, listing all authors' names for every reference and including the date of publication following the name(s). This facilitated my "cut and paste" system for making cards for each reference. I continued to follow Bill's tradition of not including any reference that I had not seen personally (with very rare exceptions). I was helped on those early lists by an exceptional editor for *The Bryologist*, Dale M. J. Mueller, who was a colleague in the Biology Department at Texas A&M.

During the years at Texas A&M and subsequent years at the University of Nebraska at Omaha, my "modus operandi" for creating the publications was to accumulate reprints in one pile on my desk and paste each reference from the ISI printouts at the bottom of a sheet of paper. I would check my giant card file for each reprint or computer reference to make sure it has not already appeared in the lists. I would make trips to the library at UNO and at the University of Nebraska-Lincoln (about 50 miles away) to locate and document comments for the entries and work through my pile of reprints. Each entry was typed in final format on the top of sheet of paper, then the sheets placed overlapping in proper sequence and photocopied in groups to create the final manuscript. Once the list was published, I made 3x5 cards for the ever-expanding drawers of cards.

Then came the computer! At last, in the early 1980's I obtained my first "personal" computer—an Apple IIe. I also found a compatible software program called "Bookends." Subject index and literature searching capabilities were now possible, if somewhat limited and clumsy at first. I jumped in with both feet! I started to enter all new references and annotations into Bookends files, created keywords, and was able to "format" the file into a text file that was close to what was need for *The Bryologist*. I moved the formatted references into a word processing file and entered diacritical marks for various language characters by hand during my final proofreading. Bookends was never able to handle these symbols. A eventually migrated from the Apple IIe system to a MS-DOS system (as did Bookends, last version dated 1987). I continued to do all initial entering of data into Bookends database files up to list number 143—when Ted Esslinger assumed authorship of list 144 in 1991 (volume 94, number 4).

During those "computer years," I began to build my computer Bookends database files by "capturing" the earlier lists that I had completed "by hand." Eventually, I had entered all my lists 101-143 into these computer files and made the files available to others on disk for a modest fee. Some used the Bookends files directly, others used Bookends modified ASCII versions of the files and imported the records into other database structures.

During my sabbatical semester, spring 1994, I decided to devote my time to "capture" the earlier lists of Bill Culberson into the "Bookends" format. I photocopied all the earlier lists for which I did not have reprints and spent weeks in front of my computer entering references until I had completed Bill's lists 1-100. This turned out to be a rather monumental task, and I know that these references suffer from numerous "typos." But, the job was done, and I made these additional database files available to others on disk in the Bookends or modified ASCII format.

Meanwhile, Ted Esslinger superbly continued to produce the lists for *The Bryologist*. Ted also continued to supply database files to other individuals in the early years, and we arranged to collaborate on this aspect of the lists, a collaboration which continues today. Ted sends me approximate "Bookends" style database files from his reference management program. I edit these files to create standard Bookends files, and Bookends ASCII text versions, and finally, in a series of steps in a word processor, convert the Bookends ASCII files to a tab-delineated ASCII file suitable to import into any database program. I return those files to Ted for each list. It was in the mid 1990s that Ted, Bill, and I were contacted by Einar Timdal about a plan to place these database files on the internet. With some wonderful scripting done at the University of Oslo, thousands of literature records compiled by Bill Culberson, Ted Esslinger, and myself were posted on the world-wide-web in searchable format on April 14, 1997.

Today, all these database files (Culberson, Egan, and Esslinger) and more (the Mattick Card Index files and additional references compiled by the late Craig Jones—all supplied via Harrie Sipman) are included in the fabulous web-based, information retrieval system maintained in Oslo by Einar Timdal. This is truly an international effort—with individuals freely supplying their research work with the "compiler" and others, like myself, helping to get that information onto the internet for all to share and benefit. Few botanical disciplines have such a fantastic resource at the click of a mouse!

Robert S. Egan, Omaha

Lichens of Azerbaijan

The Azerbaijan Republic is an independent nation occupying 86,600 km^2 on the western coast of Caspian Sea among the mountain ranges of the Greater and Lesser Caucasus and the Talish Mountains. The average height of the Republic is 384 m above sea level, the highest point is at 4,466 m (Bazar-Duzu Mountain), and the lowest landmark is 27 m below sea level of the Caspian Sea coast. Eighteen percent of the territory is below the world sea level. Valleys and lowlands occupy over 39 percent, hills up to 2,500 m cover 39.5 percent, and high mountains (above 2,500 m) are found in 3.5 percent of the territory. The Autonomus Republic of Nakhichivan within the borders of Armenia is also part of Azerbaijan's territory. The climate of Azerbaijan is mainly determined by its geographical position, topography, and the Caspian Sea. Of the 11 climatic zones known on the earth, nine are found in Azerbaijan, which is reflected by great biological diversity of flora and fauna: More than 4,500 plant species and 1,800 animal species are known from this country. There are several marked climatic zones, depending on altitude and distance from the Caspian Sea: dry subtropical, wet subtropical, temperate, and cold climates (Anonymous 1980).

The above-mentioned factors provide a highly *diversified* flora of lichens in Azerbaijan. A total of 774 species of lichens has so far been recorded in Azerbaijan (Barkhalov 1983, Novruzov 1980, Alverdiyeva 1992). The largest number of species is in the *Lecanorales*

numbering 580 species (62% of the total species number). The largest families by species number are: *Lecideaceae (109), Lecanoraceae (87), Physciaceae (72), Parmeliaceae (50), Cladoniaceae (37), Usneaceae (36), Pertusariaceae (74), Verrucariaceae (33), Aspiciliaceae (28), Peltigeraceae (17)*. About 55% (428 species) are crustose lichens, while there are 199 foliose and 147 fruticose lichens.

The information on the lichens of Azerbaijan is far from complete, and further research continues at two institutions: the Azerbaijan Agriculture Academy, Gandja (Vagif Novruzov), and the Institute of Botany, Azerbaijan National Academy of Sciences, Baku (Sevda Alverdiyeva).

References

Anonymous (1980) National Enviromental action plan. State committee on ecology and control of natural resources utilization. Baku. 68p.

Barkhalov, Sh.O. (1983) The lichen flora of the Caucasus. Baku. 388p.

Novruzov, V.S. (1980) Floristic-genetical analysis of lichens of the Greater Caucasus and the questions of their protection. Baku. 324 p.

Alverdiyeva, S.M. (1992) The lichens of the south-east part of the Lesser Caucasus (within Azerbaijan), Moscow. 30 p.

Sevda Alverdiyeva, Baku

Effect of fire on soil lichens

By the end of 2002, a discussion was started by Ray Showman, Columbus, Ohio, on the effects of fire on soil lichens. Ohio has a few areas of remnant tall-grass prairie and some of these remnant prairies contain a rich soil lichen flora. However, the management strategy to periodically burn these areas to reduce encroaching woody vegetation is apparently harmful to soil lichens. The subsequent lichens-l discussion about the effect of fire on lichens was summarized by Ray Showman and is available from him by email (*reshowman@aep.com*) or can be accessed on the IAL web pages at **webdb.uni-graz.at/~grubem/ialweb/pyrolichen.htm**. Numerous references to further work and more details on this topic are included. Some contributions suggested that fire, or some type of management, is required to create an open habitat suitable for colonization by lichens.

The Editor

LICHENOLOGY ON-LINE

A new web page of IAL

The International Association for Lichenology has a new webpage with recent informations. The page is kept in a simple format to remain accessible also for those colleagues who have a slow internet connection. It is currently located at the following address: **www-ang.kfunigraz.ac.at/~grubem/ialweb/ial.html**. The web page links to several topics. First, to "IAL", which includes information about the asscociation as well as the newsletter on-line. The link to "Discussion" contains recent on-line debates in lichenology via lichens-l. Under "People", you will find information about lichenologists such as a directory and addresses. "Societies" contains links to local lichenological societies. The link to "Lichens" will guide you to information about main current research topics in lichenology. Information about large lichenological projects are listed under "Projects", and "Other" contains miscellaneous information, links to herbaria, homepages, and so on.

The Editor

News from LIAS

LIAS became a member of the EU project Species 2000 Europa (**www.sp2000.org/**) that started in February 2003. Species 2000 is working, in partnership with other projects, to create a 'Catalogue of Life', a taxonomic checklist planned for all species in all groups, to be realised by accessing an array of different taxonomic databases. Any professional or citizen can use this information as a resource to locate species and to acquire data on a specific organism from a vast array of sources, using a single point of enquiry. Additional important users will be the European Environmental Agency (EEA), the Global Biodiversity Information Facility (GBIF) and parties to the UN Convention on Biological Diversity.

LIAS is a candidate for the project as global species database for lichens and non-lichenized Ascomycetes in near future.

Dagmar Triebel, Munich, and Luciana Zedda, Bayreuth

Automatic keys in ITALIC

Interfaces for the automatic production of identification keys were added to ITALIC, the information system on Italian lichens (**dbiodbs.univ.trieste.it**).

The keys are - for the moment - limited to the "terricolous" lichens of Italy (those found on the ground, irrespectively of wheather they occur on mineral or humic soil, strongly weathered rocks, bryophytes or plant debris). There are three interfaces: 1) a more "professional one", without illustrations, 2) an illustrated interface in Italian, 3) an illustrated interface in English. The keys are produced in English only. The program underlying the production of the keys is FRIDA, written by S. Martellos and patented by the University of Trieste. FRIDA works on subsets of lichens selected by connecting two

databases: a) ecological and distributional database; b) morpho-anatomical and chemical database. The keys in text format can be connected with the archives of distributional maps and photographs, to create illustrated guides for any subset of species defined by the user. The main aim of the keys is that of facilitating identification as much as possible, therefore they are not arranged by genera.

The on-line version produces a key only when the user is able to specify enough characters as to select no more than 15 species. The distributional-ecological filters may be useful to reduce the number of species.

The on-line production of a key of 15 species may take up to 2 minutes, depending on several factors, esp. the number of users active at a certain time.

S. Martellos and P.L. Nimis, Trieste

A preliminary list of the type specimens stored in the Herbarium of Lichens of the Komarov Botanical Institute (LE) is now accessible at: **le-lichens.nm.ru**

Yuri Kotlov, St. Petersburg

Back issues of ILN

The following back issues of ILN are still available: 9(1), 9(2), 10(1), 10(2), 11(1), 11(2), 12(1), 12(2), 13(1), 13(2), 14(1), 14(2), 15(1), 15(2), 16(1), 16(2), 17(1), 20(1) and further issues. Photocopies are available of: vol. 1(1), 1(2+supp.), 1(3), 2(1), 3(2), 6(2), 7(1–2), 8(1–2). Two indexes are also available: Index to vol. 1–8, Index to vol. 9–13. – According to a resolution of the IAL Executive Council, published in ILN 16(1), April 1983, the following charges will be levied for back issues of ILN: Vol. 1: 0.25 USD per number (3 per volume); vol. 2–8: 0.50 USD per number (2 per volume); vol. 9–13: 1.00 USD per number (2 per volume); vol. 14–17: 1.50 USD per number (2 per volume). Back issues from vol. 20–29 are available for 1.00 USD per number (3 per volume). The Indexes are free. New members will receive free only copies of the numbers constituting the volume issued for the calendar year in which they join IAL. Orders for vols. 1–29 to be sent to H. Sipman, Bot. Garten & Bot. Museum, Königin-Luise-Straße 6–8, D-14191 Berlin, Germany, fax: +49) 30-84172949, e-mail: *hsipman@zedat.fu-berlin.de*. For later issues contact the Editor.

Lichens-l is the official mailing list of IAL. You can subscribe by sending an e-mail to *listproc@hawaii.edu* with the message "SUBSCRIBE LICHENS-L YourFirstName YourLastName".

The cover-page illustration

The illustration shows a schematic drawing of a transversal ascoma section from *Ocellularia cavata*, a member of the order Ostropales. Note the apically carbonized excipulum and the carbonized columella. The drawing was kindly provided by Andreas Frisch who is currently finishing his doctoral thesis on Thelotremataceae.

List of Societies

Australasia: Australasian Association for Lichenology. Info: W.M. Malcolm, Box 320, Nelson, New Zealand. Phone & fax: (+64) 3-545-1660, e-mail: *nancym@clear.net.nz*

Brazil: Grupo Brasileiro de Liquenólogos (GBL). Info: Marcelo P. Marcelli, Instituto de Botânica, Seção de Micologia e Liquenologia, Caixa Postal 4005, São Paulo – SP, Brazil 01061-970. Fax: (+55)-11-6191-2238, phone: (+55)-11-5584-6304 (inst.), 218-5209 (home), e-mail: *mmarcelli@sti.com.br*

Central Europe: Bryologisch-lichenologische Arbeitsgemeinschaft für Mitteleuropa (BLAM). Contact: Norbert J. Stapper, e-mail: *nstapper@t-online.de*, web page: **home.t-online.de/home/blam-ev/home.htm**

Czech Republic: Bryological and Lichenological Section of the Czech Botanical Society. Info: Jiří Liška,, Institute of Botany, Academy of Sciences of the Czech Republic, CS-252 43 Pruhonice, Czech Republic. E-mail: *liska@ibot.cas.cz*

Finland: Lichen Section, Societas Mycologica Fennica. C/o: Botanical Museum (Lichenology), P.O. Box 47, FIN-00014 Univ. Helsinki, Finland. Info: Teuvo Ahti, phone: (+358)-9-7084782, fax: (+358)-9-7084830, e-mail: *teuvo.ahti@helsinki.fi*

France: Association Française de Lichénologie (AFL). Info: Damien Cuny, Laboratoire de Botanique, Faculté de Pharmacie, 3, rue du Professeur Laguesse, BP 83, 59006 Lille Cedex. Phone (+3)-209-64040 poste 4289, fax (+3)-209-59009, e-mail: *damien.cuny@wanadoo.fr*

Great Britain: The British Lichen Society (BLS). C/o: Department of Botany, The Natural History Museum, Cromwell Road, London SW7 5BD, UK. Info: Pat Wolseley, phone: (+44)-20-7942-5617, fax: (+44)-20-7942-5529, e-mail: *bls@nhm.ac.uk*, web page: **www.theBLS.org.uk**

Italy: Società Lichenologica Italiana (SLI). C/o: Museo Regionale di Scienze Naturali di Torino, v. Giolitti, 36, I - 10125 Torino. Info: Giovanni Caniglia, Dipartimento di Biologia, V.le G. Colombo, 3, I-35121 Padova. Phone: (+39)-049-8276-239, fax: (+39)-8276-230, e-mail: *caniglia@civ.bio.unipd.it*, web page: **www.lrcser.it/~sli**

Japan: The Japanese Society for Lichenology (JSL). Info: Yoshikazu Yamamoto, Secretary of JSL, Akita Prefectural University, Shimoshinjyo-nakano, Akita, 010-0195 Japan, fax (+81)-18-872-1678, e-mail: *yyamamoto@akita-pu.ac.jp*

Lichenological Society of Japan (LSJ). Nobuo Hamada, e-mail: *MXI00715@nifty.com*

The Netherlands: Dutch Bryological & Lichenological Society (Bryologische + Lichenologische Werkgroep, BLWG). Info: Dick Kerkhof, e-mail: *info@blwg.nl*, web page: **www.blwg.nl**

Nordic Countries: Nordic Lichen Society (Nordisk Lichenologisk Förening, NLF). Info: Ulrik Søchting, Dept. of Mycology, Botanical Institute, Ø. Farimagsgade 2D, DK-1353 Copenhagen; phone: (+45)-3532-2313, fax: (+45)-3532-2321, e-mail: *ulriks@bot.ku.dk*, web page: **www-hotel.uu.se/evolmuseum/fytotek/NLF/**

North America: American Bryological and Lichenological Society, Inc. (ABLS). Info: James D. Lawrey, Department of Biology MSN 3E1, George Mason University, 4400 University Drive, Fairfax, Virginia 22030-4422, USA. Phone: (+1)-703-993-1059, fax: (+01)-703-993-1046, e-mail: *jlawrey@gmu.edu*, web page: **ucjeps.berkeley.edu/bryolab/ABLS.html**

North America, Northwest: Northwest Lichenologists (NWL). Info: Bruce McCune, 1840 NE Seavy Avenue, Corvallis, Oregon 97330 USA. E-mail: *mccuneb@bcc.orst.edu*, web page: **www.nwlichens.org** (To get on the e-mail list, contact Sherry Pittam: *pittams@bcc.orst.edu*)

North America, California: The California Lichen Society (CALS). P.O. Box 472, Fairfax, CA 94930, U.S.A. Info: Janet Doell, e-mail: *aropoika@earthlink.net*, web page: **ucjeps.herb.berkeley.edu/rlmoe/cals.html**

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