VI. MISCELLANEOUS INFORMATION (contd from p.899)

a) Research and Publications:

Walker, F.S.: The forests of the British Solomon Islands Protectorate. A new printing of this book, which never received a very wide distribution, appeared in 1962. It gives a general description of the vegetation, based on 18 months of survey and detailed notes on about 300 species collected by Walker and C.T.White. Useful for both botanist and forester.

Copies cost Austr.£ 2.- (i.e. about 34 Sh. Sterling or US \$ 4.50); enquiries should be addressed to the Chief Forestry Officer, P.O.Box 6, Honiara, British Solomon Islands.

Mr. K. M. K o c h u m m e n of the Kepong Forest Research Institute has prepared field keys for all Malayan timber species mentioned in the Pocket Check List. The intention is to produce an enlarged revised edition (the present issue being out of print), but it is probable that the data will come out in the Forest Research Pamphlet series first.

Flora of China. In Act. Bot. Sinica vol.10 (1962) there is a paper of nomenclatural changes to volume 11 of this work by T. T a n g and F. T. W a n g, containing the Cyperaceae (Scirpeae-Sclerieae), which would have been published in 1961. As far as we could ascertain no copy has reached the western world; though the Rijksherbarium has a standing order for subscription no copy was received. Also no copies are offered by bookshops which have regularly announcements of Chinese works. Has the book been published indeed and what should be the date of its publication according to the Rules?; that is a question.

Flora Europaea. The final MS of volume 1 is now completed and is being checked for submission to the publishers. It will contain the Pteridophyta, Gymnosperms, and Dicotyledons up to the Platanaceae, following the Englerian sequence. Preparation of volume 2 is underway.

Pollen research in northwestern Borneo. Mr. J. M u l l e r of Brunei Shell Petroleum Cy, Seria, Brunei, has during a couple of years occupied himself with investigations of the Tertiary in that region. While on leave, in January 1963, he communicated some of his results in a most interesting lecture to the staff of the Rijksherbarium. The Shell Company is carrying out drilling in the open sea about 100 km offshore, and the pollen in the samples thus collected yield many important data with regard to the geological and botanical history of the area. Mr. Muller thus found pollen of Alnus, Ephedra, Picea, and Tsuga in Miocene sediments. This finding of 4 genera nowadays definitely absent from Malaysia, presents a fascinating plant-geographical problem of a wide impact on our ideas of the geological history of Borneo and adjacent areas.

A cooperation is going on between the Shell Company and the North Borneo Forest Department. The latter supplies samples from Kinabalu plants, and of lowland Dipterocarps, and receives back slides of pollen in exchange.

Dr. H. P. F u c h s of the Shell Company at The Hague, Holland, will leave in July 1963 to make a collecting trip of several weeks in Sarawak, with the aim of collecting pollen material of riverine plants. He will be accompanied by Dr. H. S l e u m e r of the Rijksherbarium, who means to combine this trip with his participation of the UNESCO symposium at Kuching.

Russion-Indonesian Cooperation. In September 1962, Dr. Jakovlev, a Russian plant-embryologist who worked a.o. in Paeonia, arrived at Bogor to take there an appointment as a permanent Russian expert for tropical botany in Indonesia.

Mr. H. O. Whittier, instructor at the Department of Botany, University of Hawaii, prepared a Checklist of Polynesian Mosses, a project begun by Dr. H. Miller, Miami. For a doctoral dissertation he is now working on a taxonomic and phytogeographic study of the mosses of the Society Is, later to be extended to the mosses of the Marquesas.

Foresters' Manual of Dipterocarps. Originally begun by the late Mr. G. H. S. Wood, at the Sandakan Herbarium, this work has now been concluded by Dr. W. Me ijer, who reported that by May 1963 the text and illustrations had been made ready for the printer. The book will embody the results of long and intensive field work on dipterocarps in North Borneo, and of correlating work in European and American Herbaria by Dr. Meijer while on leave.

Genera Plantarum. Dr. J. H u t c h i n s o n wrote from Kew that the first volume of his magnum opus is now almost ready for the press.

Willis, Dictionary. Mr. H. K. A i r y S h a w of Kew, who is responsible for a new up to date edition of this work, envisages that the MS will be ready for the press in the course of 1963, a prospect we are very pleased to learn.

Advancing Frontiers of Plant Sciences. This is a new international journal published by the Institute for the Advancement of Science and Culture in New Delhi, India. The planned rate of publication is extraordinary: every second month one volume (at a price of US \$ 7.--), it is announced. The series is to cover practically all fields of plant science: physiology, agriculture, taxonomy, ecology, horticulture, evolution, experimental taxonomy, forestry, phytopathology, etc.

The Conch Shell (Bishop Museum News) appears in a new format in the spring 1963 issue (vol.I no 1). Sponsored by the Bishop Museum Association, Hawaii, as in the past, its aims are to provide an interesting and stimulating means of communicating news of Museum programs in research and exhibition, staff activities, and informative articles covering a wide range of subjects. The Bishop Museum's collections con-

tain many different types of materials: diaries, field accounts, prints, photographs, historical documents, unpublished manuscripts as well as artifacts and specimens. This new bulletin provides a means to present some of this material with graphic illustration and attractive presentation. Editor and designer is Joseph Feher; there are several contributing editors. Subscription price is US \$ 4.-- a year for this quarterly issue; single copies US \$ 1.--. It is sent free to all members of the Bishop Museum Association. -- From Haw.Bot.Soc.Newsletter.

Micronesica. The College of Guam is inaugurating a journal devoted to the sciences in Micronesia, under the above name. In particular, the fields of anthropology, botany, and zoology will be included, with a focus on the Micronesian area of the Pacific, but not excluding other related Pacific regions. Editor Is Dr. B. C. S t o n e, P.O.Box 97, Agana, Guam. Subscription price will be less than US \$ 5.-- for the first volume. The College of Guam is also most interested in exchanging publications, and Micronesica is available on an exchange basis to institutions publishing in the disciplines mentioned above.

Micronesica is an international journal published in English but welcoming contributions from research workers all over the world. Summaries in other languages will be accepted. In the biological disciplines, emphasis is laid on systematic botany, systematic zoology, general ecology, and marine studies. The journal would accommodate reports concerned with other areas of the Pacific, especially when Micronesia is touched on. Special consideration will be made of papers of an interdisciplinary nature. More information on request.

b) <u>Herbaria</u>, <u>Gardens</u>:

Rijksherbarium, Leiden. H.J.Lam, Verslag van de Hoogleraar -Directeur over 1961-1962 (Dec. 1962), 71 pp., in Dutch. The Annual Report of the Director, Professor Dr. H. J. L a m, who retired on 31 August 1962, contains the reports of the scientific staff in the divisions European and Netherlands flora, Tropical flora and Flora Malesiana, Mycology, Algology, Morphology, the technical staff and education. It contains also a list of publications produced by the institute.

There are at present 19 regular scientific staff members, and 28 technical personnel. Out on loan went over 12,000 specimens, received on loan were over 17,000; duplicates distributed amounted to over 6,000; phanerogams received to over 25,000. Mounted specimens number over 27,000, inserted into the collections were over 96,000 specimens.

The institute is so crowded that it takes an average of several minutes hard muscular labour before a specimen can be

got hold of. After the first warning of the Director in 1934, plans are now ripe for a move of the while institute to the building of a former wool factory in the vicinity. This will serve as a temporary abode (the "Provisorium") until a building will have been constructed as a part of a large extension of the University, near Leiden.

Lae Herbarium. In 1963 the post of Curator of the Botanic Gardens will be filled. In June 1962 the authorities agreed to build a new Herbarium.

At Kauli Creek, above Wau, Territory of New Guinea, the McAdam Memorial Park has been established, at c. 1300 m altitude, in the place where the Forestry Service made the first experiments with planting Araucaria. It is situated in the Araucaria plantations surrounded by a wide girdle of primary fagaceous forest.

Indian Botanic Garden, Calcutta. This famous old Garden, formerly known as "Royal Botanic Garden, Calcutta" was transferred from the Government of West Bengal to the Government of India. It will henceforth function as a unit of the Botanical Survey of India. The transfer was effected just as the Garden was completing its 175th year since its foundation.

This is indeed another feature contributing towards a widening and centralization of the Botanical Survey of India which will add to its value as the main centre of studies on the Flora of India. To celebrate the occasion it is planned to bring out a special volume of the Annals of the Indian Botanic Garden.

Tropical Garden in Hawaii. As a sequel to the recent conferences on Tropical Biology and Neotropical Botany (Miami 1960, Costa Rica and Trinidad 1962), plans are being worked out towards the establishment of a U.S.National Tropical Botanic Garden.

Charles A. Lamoureux, Haw.Bot.Soc.Newsletter (May 1963) 74-75, gave summaries of the reports from both the survey teams which visited Hawaii. The first team, from the Botanical Society of America, consisted of Dr. P. Dansereau, Dr. Frits Went, Dr. W.S.Stewart. The second team, from the U.S. Department of Agriculture, consisted of Dr. H.T.Skinner, Dr. F.de Vos. Dr. J.L.Creech.

The reports stress the urgency to establish a well-staffed well-equipped Tropical Botanical Garden, on U.S. Territory, as soon as possible, situated in Hawaii, on the island of Oahu. One has also thought of branch gardens to represent different habitats. Preliminary estimates of costs of operation range from US \$ 300,000 to 1,000,000 annually.

It is considered "that a broadly conceived, properly established, and efficiently operated botanic garden situated

in Hawaii could serve a valuable purpose as a Pacific center for research on those many botanical, agricultural and horticultural problems of plants and plant crops, which have already been too long neglected. It could fill an equally real need in providing a means for the training and education of student representatives of the Pacific-bordering tropics, or from the mainland, or any country that have a serious interest in botanic garden operation and in the study of research methods with respect to tropical crops and vegetation."

Botany at B.P.Bishop Museum, Hawaii. The following was extracted from an interesting paper which gives a condensed historical survey, compiled by Alvin K. Chock from the Director's Annual Reports, and published in the mimeographed Newsletter of the Hawaiian Botanical Society (May 1963) pp. 57-65. The Newsletter is published nine times a year to members of the Society, c/o Department of Botany, University of Hawaii, Honolulu 14, Hawaii, U.S.A. Fee US \$ 2.-- per calendar year.

The Museum was founded by Charles Reed Bishop (1822-1915) in 1889 as a memorial to his wife Bernice Pauahi Bishop (1831-1884). By the turn of the century the activities were expanded throughout the Pacific. Exchange relations date from 1908 (Sydney) and 1910 (Manila and Paris). C.N. Forbes made large scale explorations in Hawaii between 1908 and 1920. The Museum issued its Special Publications (1892-hodie), Memoirs (1898-1949), Occasional Papers (1898-1923; 1930-hodie), and Bulletins (1922-hodie). It has now issued 182 botanical papers. In 1922 the combined herbaria of the University of Hawaii and the Board of Agriculture and Forestry were incorporated into the Museum's Herbarium.

The inauguration of large scale explorations in Polynesia took place in 1920. From that year till 1956 E.D.Merrill served as an Honorary Consultant in Botany. From 1920 to 1949 he made records of Polynesian species described in literature. depositing a set of these pink slips in the Museum. In 1928 E.H.Bryan Jr supervised the initial compilation of a card catalogue of specimens in the Herbarium which is being continued to this date. He also started a checklist of Hawaiian species and botanical publications. In 1931 Otto Degener began to deposit a set of his collections in the Herbarium. In 1957 an expedition was made to the Sulu Sea, in combination with the Philippine National Museum. In 1960 the Pacific Scientific Information Center was established at the Museum. which this year will produce a new List of Pacific Botanists. The exchange of duplicate specimens, interrupted again in the 1950s, was resumed this year. The Herbarium now contains about 250,000 specimens.

An Appendix contains the names of the members of the regular staff, the honorary staff, and the Bishop Museum Fellows.

Sandakan Herbarium. During the second half of 1963 the collections are going to be arranged in the new Herbarium building which is now about completed. The exchange of duplicates (7259 were distributed in 1962) will be taken up again with Arnold Arboretum and Smithsonian Institution.

One of the objectives is still the preparation of a Foresters' Manual of non-dipterocarps, possibly together with the Forest Department at Kuching. Lack of old collections is a serious obstacle, but this has led to more intensive study of field characters for the distinction of species. A provisional key to genera of timber trees was prepared, and information is now at hand for a preliminary checklist of species. It is regrettable that habitats with distinct forest types will disappear before a full scientific study can be made. Such a study, too, would provide valuable information on the potential timber stand.

Another scientific misfortune is the possible loss, owing to pressure on land near Kundasang, of the recently discovered localities bearing Trigonobalanus verticillatus, the newly discovered genus of the Fagaceae on Kinabalu between 1200 and 1800 m.

Sandakan Arboretum. Efforts to open up the proposed Kebun China Forest Reserve with paths were continued. More than 300 trees were given numbers and labels during 1962, and a checklist of the treeflora was prepared. The administrative endeavours to get this area back under government rule were fruitless. Meanwhile, the local public itself asked for another Nature Reserve, Mt Walker, to the South of Kebun China. This is, however, much less rich in dipterocarps and other timber trees typical for the commercial forests.

Explorations will be continued in both plots. It is, of course, of great importance to have undisturbed areas at a convenient distance from Sandakan for the study of special trees.

c) Symposia, Congresses, Societies, and Committees:

International Union for Conservation of Nature and Natural Resources (IUCN). The 8th General Assembly and 9th Technical Meeting will be held in Nairobi, Kenya, from 16 to 24 September 1963. The theme of the Technical Meeting will be "The Ecology of Man in the Tropical Environment". The following subjects will be discussed: 1) pre-industrial man in the tropical environment, 2) ecosystems and biological productivity, 3) the impact of man on the tropical environment, 4) ecological research and development.

First World Conference on National Parks. This was held at Seattle, Washington, U.S.A., from 30 June to 7 July 1962. Its main purpose was to coordinate efforts to preserve nature

undertaken by countries that are members of the United Nations. Governments of member states had therefore been invited to send delegates; interested organisations to send an accredited observer. — From SEASCO Information Bulletin No 19.

Conservation in tropical Southeast Asia. Following the concern expressed at the 10th Pacific Science Congress, a regional meeting of specialists was convened at Tjiawi near Bogor, on 16-18 February 1962, by the UNESCO Southeast Asia Cooperation Office (SEASCO). The meeting was an exploratory one, to exchange ideas and to find ways and means of promoting international collaboration between the countries of the area in conservation matters. A regional Working Group was established, with Dr. Boonsong Lekagul of Thailand as Honorary Secretary. The Group would advise SEASCO and call to the attention of government inadequacies in legislation or its enforcement. The next regional meeting is planned in 1964.

Early action was recommended for Rafflesia. -- From the Pac.Sc.Ass.Inform.Bull. 14 (1962) 3-4.

Symposium on Biosystematics, Montreal 1962. This was organized by the International Organisation of Biosystematics. Its proceedings have been published March 1963, as Regnum Vegetabile vol.27 (format and printing of Taxon), 72 pp. The ten contributors dealt largely with biosystematic problems of plants, cryptogams and phanerogams; together these papers represent a welcome stimulant for systematic thought.

UNESCO Humid Tropics Symposium, Kuching. Convened by the Southeast Asia Unesco Cooperation Office (SEASCO) in collaboration with the Sarawak Government, a Symposium on the Vegetation of the Humid Tropics was held at Kuching between 2 and 11 July 1963. The Symposium was divided into two sections: 1) Recent advances in plant ecology in the Humid Tropics, 2) Quantitative Methods in the study of the ecology of Humid Tropics vegetation. The two sections are complementary, the first having an eye on current work, the second on future work.

The number of participants was restricted to 30-40 invited specialists from various countries. Field trips were organized to Bako National Park, Semengoh Forest Reserve, the Bau limestone hills, and a post-symposium tour was conducted to Brunei to visit a highly developed raised bog which was recently the subject of a palynological study, and to heath forest dominated by Agathis dammara on a very deep podzolic soil. Several members also took the opportunity to visit Mt Kinabalu.

The Neotropical Botany Conference held at Trinidad on 2-6 July 1962. The Proceedings have been issued as Bulletin No 1

of the Association for Tropical Biology (1962) 120 pp., price Sh. 10/- or W.I. \$ 2.50. There were thirty participants, invited by the National Science Foundation, Washington. The conference had largely been prepared by Prof. J. W.Purseglove of the Faculty of Agriculture, Trinidad, which had offered the facilities.

The chief aim of the conference was to look at the main problems of Tropical American Botany in all its major disciplines, and to see what should be done and what facilities there are towards a solution. The result is an impressive number of resolutions and recommendations, with the overall purpose to stimulate and coordinate science and to protect nature.

Another result is the constitution of the Association for Tropical Biology, Chairman of the working committee being Prof. J.W. Purseglove, Imperial College of Tropical Agriculture, St. Augustine, Trinidad; members are Dr. Tobias Lasser, Caracas, and Dr. Bassett Maguire, New York. Membership is open to all who are interested in tropical biology; the fee is US \$ 1.-- per annum, to be paid to the Chairman.

The A.T.B. is to publish a Bulletin as a medium of communication. The present number of the Bulletin contains the delivered addresses in full, and a list of Biological Research Centers in Tropical America with the facilities they have to offer.

Visiting Committee for tropical Herbaria. This Committee was established in 1961 under the auspices of UNESCO; particulars were given in this Bulletin on p.812. After the first session at Leiden in 1961, two more sessions have now been held, with the same members, notably Dr. F.R. Fosberg (chairman), Dr. H.J. Lam, Dr. A.C. Smith, and Sir George Taylor. One session took place in October 1962 at Sao Paolo, Brazil; on this occasion members visited tropical Herbaria in the western Hemisphere. The third session was held at Singapore on 28 and 29 June 1963; on this occasion Herbaria were visited in SE.Asia, tropical Australia, and the Pacific, by members on their way to and back. It is proposed that Herbaria in Africa will be visited next time.

A complete draft of the proposed Manual for tropical Herbaria, written by Dr. Fosberg, was thoroughly discussed and will probably appear in print within a reasonable period. This Manual will contain all sorts of information with regard to tropical Herbaria, their establishment, maintenance, policy, etc.

d) <u>Unclassified news:</u>

Typhoon over Guam. "The damage is actually immense to the island and its villages but fortunately the College of Guam was hurt very little. You would be appalled but interested to see the island. Not a vestige of green remained after the winds, which reached 200 miles per hour. No leaves at all except on coconuts and pandans! It was like a winter landscape, or the aftermath of a rapid fire. Almost no big trees survived; breadfruits, mangoes, Samaneas, Calophyllums etc., all broken to bits and/or uprooted. Many coconuts were snapped in two, but most survived. Now, two weeks later, most of the Leucaena is budding new leaves, also the kamachili (Pithecellobium dulce).

Thanks again so much for your concern, and for your previous letters with the identifications. Our "determinations" are rather hot and hasty here, our time being much limited and facilities few - we appreciate vastly your assistance. We still have our herbarium intact, although the electricity has only just been restored and there may be some humidity damage." -- This is from a letter, dated 27 November 1962, by Dr. Benjamin C. Stone, who after taking a post at the College of Guam, Agana, Guam, last year, is now energetically pursuing botany.

VARIA

"Advice sometimes given to young authors is to go over what they have written and then knock out half the adjectives.

I think that is asking too much. It is great fun for the writer to use adjectives and, in descriptive writing, adjectives well-chosen are useful and even essential. But too many are a nuissance.

Above all, it is wise, especially for those starting to write English, to keep an eye on 'who' and 'which'. When I look over my own writing I often prune away these relative clauses. If, for example, I have written: 'The policy of controls which the government is urging is one which no man who thinks twice and to whom freedom is precious can possibly support at the elections which are shortly to be held' I should be ashamed of such clumsiness and I would substitute: 'No thinking man or lover of freedom can possibly support at the forthcoming elections the government's policy of controls.' Surely that is much tidier, more easily read and understood; and the object of all writers should be simply that: to be easily and clearly understood." -- Ivor Brown, English By Radio, issued by the B.B.C., number 9 (1963) 3.