

REVIEWS

I. Studies in Thai Botany :

During 1966-1967 the study in Thai Flora was very active as there appeared in the *Dansk Botanisk Arkiv* Bind 23, Number 3, December 1966, the *Southeast Asian Studies* Volume 5, Number 1, June 1967, and the *Acta Phytotaxonomic et Geobotanica* Volume 22, Numbers 4-6, May 1967, series of the contribution to the Flora of Thailand.

1) **Dansk Botanisk Arkiv, Bind 23 (3), December 1966.** This issue is devoted to Studies in the Flora of Thailand 35-40, in which eight botanists have contributed as follows :

35. Dr. C.E.B. BREMEKAMP of Utrecht gives an account of the *Thunbergiaceae* and *Acanthaceae*, four new Acanthaceous species were described: *Golfussia lauginosa* BREM., *Lepidagathis brevipica* BREM., *Andrographis rosulata* BREM., and *Rungia angustifolia* BREM.
36. Dr. Bertel HANSEN of Copenhagen gives a preliminary study of the *Rutaceae* of which a new species, *Micromelum glanduliferum* B. HANSEN is being described.
37. Dr. Bertel HANSEN gives a second list of *Sphagnaceae*, where 5 species are enumerated, and *Sphagnum khasianum* MITT. is being reported for the first time from Thailand.
38. Drs. H. SLEUMER of Leiden, H.N. MOLDENKE of New York, N.L. BOR and R.E. HOLTTUM of Kew contributes on various families in which *Agapetes lobbii* C.B. CLARKE and *A. bracteata* HOOK.F. ex C.B. CLARKE (*Ericaceae*) are new to Thailand; *Congea hansenii* MOLD. (*Verbenaceae*) is being proposed as new to science; *Germainia khasiana* HACK. (*Graminae*) is new to Thailand; *Tectaria gymnosora* HOLTT. and *Diplazium latilobum* HOLTT. (*Dennstaedtiaceae*) are new species.
39. Dr. Marcel RAYMOND of Montreal gives a full account of Thai *Cyperaceae*, in which 20 genera and 224 species are enumerated, and to accommodate the unusual *Scleria tonkinensis* C.B. CLARKE a new section, TONKINENSES RAYMOND has been created; also

a new section, KERNIAE RAYMOND has been proposed to accommodate a group of perennial, cylindrical-spikeleted *Fimbristylis*.

In this study the following species are reported for the first time from Thailand: *Scirpodendron ghaeri* (GAERTN.) MERR., *Scirpus mattfeldiana* KUKENTH., *Fimbristylis aphylla* STEUD., *Fimbristylis dictyocolea* S.T. BLAKE, *Fimbristylis nigro-brunnea* THWAITES, *Fimbristylis nanofusca* TANG & WANG, *Fimbristylis tenuicula* BOECK., *Cyperus melanospermus* (NEES) VALK. SURINGAR ssp. *bifolius* (MIQ.) KERN and *Carex thompsonii* BOOTT.

40. Dr. Kai LARSEN of Aarhus gives the second account of the cytological study of Thai vascular plants covering families, *Cycadaceae*, *Smilacaceae*, *Eriocaulaceae*, *Orchidaceae*, *Menispermaceae*, *Chenopodiaceae*, *Amaranthaceae*, *Droseraceae*, *Capparidaceae*, *Juglandaceae*, *Moraceae*, *Salvadoraceae*, *Combretaceae*, *Halorrhagidaceae*, *Vacciniaceae*, *Plantaginaceae*, *Valerianaceae* and *Sphenocleaceae*.

Except *Eriocaulon sexangulare* L., *E. truncatulum* L., *Cymbidium insigne* ROLFE, *Drosera burmanni* VAHL, *Cleome viscosa* and *Plantago asiatica* L. the rest have their chromosome counts for the first time.

2) The Southeast Asian Studies Vol. 5 Number 1 June 1967.

On pages 23-120 Drs. M. TAGAWA and K. IWATSUKI give an enumeration of Thai Ferns collected during 1965-66. In this study 116 genera and 442 species are recognised. The taxonomic sequences follow that of HOLTUM (1954) but certain generic concepts differ, e.g. *Abacopteris* and *Cyclosorus* are sunk under *Thelypteris*, *Hymenophyllum* SM. is split into 3 genera: *Meringium* PRESL, *Hymneophyllum* SM. and *Mecodium* PRESL; *Trichomanes* LINN. is also split into 11 genera: *Microgonium* PRESL, *Didymoglossum* DESV., *Gonocormus* VAN DEN BOSCH, *Microtrichomanes* (METT.) COPEL., *Pleuromanens* PRESL, *Crepidopteris* COPEL., *Crepidomanes* PRESL, *Cephalomanes* PRESL, *Macroglena* COPEL., *Vandenboschia* COPEL., and *Selenodesmium* COPEL.; *Lepisorus* (J.SM.) CHING is transferred to *Pleopeltis* HUMB. & BONPL. ex WILLD.; *Phymatodes* PRESL is partly sunk under *Microsorium* LINK, and *Crypsinus* PRESL; *Rumohra* is included in *Arachniodes* BL.

3) *Acta Phytotaxonomica et Geobotanica* 22 (4-6,) May 1967.

Four articles are devoted to Thai botany :—

a) Drs. M. TAGAWA & K. IWATSUKI : *New or interesting ferns from Thailand* 1, pp. 97-103. The following species are recognised as new to science : *Lygodium giganteum* TAGAWA & IWATS., *Microgonium minutifolium* TAGAWA & IWATS., *Gonocormus siamensis* TAGAWA & IWATS., *Arthromeris phluangensis* TAGAWA & IWATS. and *Thelypteris siamensis* TAGAWA & IWATS.

b) Dr. J. OHWI : *Four New species of Glumales from Southeast Asia* pp. 138-140. Four new species are described from Cambodia and Thailand, the Thai species are *Eragrostis udawnensis* OHWI (*Graminae*) and *Carex platyrrhina* OHWI (*Cyperaceae*).

c) Dr. Minosuke HIROE : *Umbelliferae of Thailand II.* pp. 141-144, 1 fig. An enumeration of 10 species is given; a new variety is proposed: *Peucedanum siamicum* CRAIB var. *payapicum* HIROE.

d) Mr. Nobuyuki FUKUOKA : *Sambucus and Viburnum of Thailand* pp. 163-174, 1 fig. Under *Sambucus* 2 species are treated with an identification key. The genus *Viburnum* is consisted of 10 species; a new variety is recognised, *Viburnum sempervirens* HIROE var. *smitinandii* FUKUOKA. An identification key is also provided.

II. Studies in Thai Mollusks.

In the *Spolia Zoologica Musei Hauniensi* Volume 24, 1966 Dr. Alan SOLEM, Curator of Lower Invertebrates, Field Museum of Natural History, Chicago, publishes the result of his study on the Thai freshwater mollusks under the title "*Some non-marine Mollusks from Thailand, with Notes on Classification of the Helicarionidae.*"

The collections studied were collected by Dr. Birgit HANSEN during 1958-1959, Dr. Palle JOHNSEN in 1962-1963 and that of the recent expeditions, including Dr. Jorgen KNUDSEN's small collection from Laos and South Vietnam. It is comprising of 54 species from Thailand and 4 from Laos and South Vietnam. Two new Helicarionid genera—*Teraia* and *Muangnua* are proposed and eight species are described as new to science : *Sesara parvula* SOLEM, *Teraia thailandica* SOLEM, *Durgella libas* SOLEM, *Cryptaustenia gadinodromica* SOLEM,

Muangnua limax SOLEM, *Austenia doisutepensis* SOLEM, *Plectopylis degerbolae* SOLEM, and *Plectopylis simplex* SOLEM.

This is so far the third and largest contribution to the knowledge of Thai freshwater molluscs within this decade. The distribution notes contain a very interesting comparison between the collections from Doi Chiengdao and Doi Suthep, as it shows a marked difference of the molluscan fauna of the limestone and granitic formations.

T.S.