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Cymae terminales et in axillis superioribus trichotomae nunc densiflorae et ample paniculatae pendentes, nunc pauciflorae erectae. Flores brevissime pedicellati, bracteolis (prophyllis) 2, pedicello insertis calyce appressis eoque brevioribus instructi, nunc parvi nunc conspicui.

Subgenus I *Eucoptosapelta* VAL. Calycis limbus ovario brevior. Corollae tubus brevis, limbi lobos aequans vel illo brevior, faucis orificium glabrum vel hirsutum. Antherae lineares, basi bifidae, dorso dense villosae, demum tortae. Stigma elongato-fusiforme vel quadrangulare. Seminum ala fimbriata. Frutices alte scandentes ramulis subteretibus. Foliis majusculis patentibus subtus ad nervos villosis. Paniculae terminales foliatae multiflorae, densiflorae, pendentes.

1. *C. flavescens* KORTH., (*Stylocoryne racemosa* haud CAVANILLES, MIQ.; *St. tomentosa* BL.): Corollae tubus limbi lobos circiter aequans, faux glabra. Calycis tubus brevis.

Habitat: Malacca, Burma, Borneo, Java.

2. *C. Griffithii* Hook.: Corollae tubus limbi lobis multo brevior. Faux dense hirsuta. Calycis tubus elongatus.

Habitat: Malacca, Singapore.

Subgenus II. *Lindeniopsis* VAL. Calycis limbus ovario plus duplo longior, ad basin usque partitus segmentis erectis lanceolatis acutis. Corollae tubus gracilis lobos pluries superans, faucis orificio glabro. Antherae oblongae basi bilobae, glabrae. Stigma magnum, clavatum. Seminum ala subintegra.

Frutices parvi erecti, ramulis acute tetragonis erectis elongatis, foliis parvis erectis rigide-coriaceis, spinuloso-apiculatis subtus appresse villosis. Cymae terminales et in axillis superioribus trichotomae, pauciflorae, erectae.

3. *C. Hammii* VAL. Characteres subgeneris.

Habitat: Biliton.

Botany. — “*Contribution N°. 1 to the knowledge of the Flora of Java.*” (Third Continuation)¹). By Dr. S. H. KOORDERS.

§ 6. Further data concerning *Oreostachys Pullei* Gamble.

§§ 1. Additions and corrections to p. 674—686 of the “Proceedings”.

The proof-corrections, which Mr. GAMBLE sent me from England last April, were, nevertheless, much to my regret, received by the printers too late for incorporation in the number of the Proceedings

¹) Continued from p. 773 of the Proceedings of the Royal Academy of Sciences, Amsterdam, ordinary meeting of the Math. and phys. section April 9th. 1908.

of the Royal Academy of Sciences, which appeared in April 24th 1908. I now append these proof-corrections, which date from last April and are due to Mr. J. S. GAMBLE, to whom I tender my thanks:

p. 683 line 11 from bottom: *after* Kurz, *insert*: Munro in Trans. Linn. Soc. London. XXVI. 146.

p. 683 line 4 from bottom: *before* (GAMBLE msc.) *insert*. and possibly. so establishing a connection between it and the *Schizostachyum*, the description of which by HASSKARL and KURZ are somewhat imperfect".

p. 683 line 4 from bottom: *after* additional *insert*: material.

p. 684 line 16 from bottom: *before* conspecific *insert*: very probably.

§§ 2. On the fruits of *Oreiostrachys* GAMBLE, which have been discovered by Mr. K. A. R. BOSSCHA.

On p. 684 of the English edition of the Proceedings of the Royal Academy of Sciences, Amsterdam, meeting of February 28th 1908, it was pointed out by me, that it might be possible to trace this species locally by means of the constant native name, i. a. in order to obtain the fruits, as yet unknown.

I am now privileged to announce the collection of these fruits, as yet unrecorded in the literature, and to communicate certain further details, taken from a letter of Dr. TH. VALETON, dated Buitenzorg May 12th 1908 and from the enclosures to his letter, for which I here wish to thank him.

"Enclosed I am sending you three fruits of *Oreiostrachys* GAMBLE, of which ten were sent me in November 1903 by Mr. K. A. R. BOSSCHA, after I had received in May flowers from the same station. I propose that you should send these to Mr. GAMBLE, in order that he may complete his generic description, which has been published by you I am also sending you some notes about observations, made in the locality by Mr. BOSSCHA, and further some references to the literature, which already exists about this species." (Dr. VALETON msc. May 12th 1908).

I quote below the paragraphs in the letter referring to the observations of Mr. BOSSCHA.

"Mr, BOSSCHA drew my attention to the fact, that the plant bears flowers in two ways, namely at the end of small branches¹⁾ with

¹⁾ Mr. GAMBLE and I have not, as yet, had at our disposal these thick-leaved branches, flowering at their ends, but only the sterile leafy branches of JUNGHUHN and the almost leafless flowering twigs, without fruits, of PULLE described by Mr GAMBLE.

thick foliage and also close to the stem on quite leafless lateral branches."

"Mr. BOSSCHA also told me, that when he arrived in Malabar in 1896, old natives, who were thoroughly familiar with the forests of the district in which the plant occurs, were ignorant of the fact, that this bamboo had ever flowered. In 1902 the flowering began, and it recurred fairly regularly until 1906. Since then the species has died off in most places, and is now decidedly scarce. This year it has again, however, been found in flower in Taloen (a plantation on the Malabar) in May 1908."

"Now, however, young plants are beginning to appear every where, obviously self-sown."

"This phenomenon partly agrees therefore with what has been observed in the case of other bamboo-species in British India, although the flowering period has been especially long in this case". (Dr. VALETON msc. May 12th 1908).

While I here refer with special appreciation to the fact that Dr. TH. VALETON placed the three fruits and the above-mentioned data at my disposal, I need scarcely say, that I at once complied with his request, and sent the fruits, received by me on June 17th to Mr. GAMBLE. Although the examination of the fruits is not yet complete, and will be referred to later, as soon as the supplementary diagnosis by Mr. GAMBLE shall have been received, I nevertheless consider the discovery, by Mr. K. A. R. BOSSCHA, of the fruits of this bamboo-species of sufficient importance to call for attention here. It is evident from Dr. VALETON's letter quoted above that the receipt by him at Buitenzorg from Mr. BOSSCHA of the fruits of *Oreostachys* GAMBLE with the flowers (the fruits having remained unknown in the literature until now) was prior to Mr. GAMBLE's discovery of the type of a new genus in the flowers collected by Dr. PULLE.

It may further be mentioned, that the fruits discovered by Mr. BOSSCHA, and the flowers collected by Dr. PULLE on the Wajang-Windoe in 1906, are from the same district, namely the locality mentioned on p. 686 of these Proceedings.

In an enclosure to his letter to me of May 12th Dr. VALETON gives certain specific names, which he regards as synonyms (*Bambusa elegantissima* Hassk., etc.) and also the other literature references relating to this subject. Since these names, and the literature references, with the exception of "MUNRO" (see above, §§ 1), have already been published by Mr. GAMBLE and myself in the Proceedings of April 24th, it seems to me unnecessary to repeat them.

Although I have not had at my disposal the terminally flowering

branches with thick foliage collected by Mr. K. A. R. BOSSCHA, on which Dr. VALETON's addition to GAMBLE's diagnosis is based, I can now conform this amplification of GAMBLE's diagnosis, sent me on May 12th by Dr. VALETON, thanks to supplementary material received to-day (June 27th 1908) from Dr. A. PULLE (Utrecht) and at once forwarded to Mr. GAMBLE. In order to complete the diagnosis of *Oreiostachys*, and to settle the question of the further probable synonymy of this interesting species, a question raised by Mr. GAMBLE and myself in the Proceedings of April 24th there now only remain as desiderata the collection of stem-sheaths and the examination of the authentic specimens of *Bambusa elegantissima* HASSK. and *Schizostachyum elegantissimum* (HASSK.) KURZ, which so far have not been found, either by Dr. VALETON at Buitenzorg, or by myself at Leiden or Utrecht.

Leiden, June 27th 1908.

Physics. — “*On the law of molecular attraction for electrical double points*”. By Prof. J. D. VAN DER WAALS JR. (Communicated by Prof. Dr. J. D. VAN DER WAALS).

Several physicists have already urged the supposition that the molecular attraction results from the electric forces exercised by electrically charged particles which are contained in the molecule. One of the simplest suppositions we can make in trying to explain the molecular action from an electrical origin is that the molecules will behave as electrical double points. This has, in fact, been assumed by Mr. REINGANUM¹) and by Mr. SUTHERLAND²).

As the formula for the action between two electrical double points, which is the same as that for the action between two magnetic molecules³), contains $\frac{1}{r^4}$ as a factor, — r representing the distance between the two double points, — these physicists concluded that the molecules would attract one another with a force proportional to $\frac{1}{r^4}$. The opinion that the electron-theory supports the supposition of a molecular attraction proportional to $\frac{1}{r^4}$ has accordingly been often advanced.

¹) M. REINGANUM, Phys. Zeitschr. 2, 241 (1901); DRUDES Ann. 10, 334 (1903).

²) W. SUTHERLAND, Phil. mag. (6) 4, 625 (1902).

³) Cf. J. C. MAXWELL, A treatise on electr. and magn. Art. 387.