New Species of Dipterocarpaceae, Sterculiaceae and Monimiaceae, and a re-interpretation of Tetranthera rumphii Bl.

by

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Herbarium Bogoriense

DIPTEROCARPACEAE

Hopea celtidifolia Kosterm., spec. nov.

Arbor ramulis minutissime dense adpresse stellato pilosis, foliis chartaceis vel rigide chartaceis glabris ovato-ellipticis acuminatis basi in petiolem gracilem contractis supra nitida laevia nervo mediano prominulis costis vix prominulis subitus sublaevia nervo mediano prominentibus nervis lateralis inferiore parte erecto-patentibus superiore parte subito verticalibus totis nervum basalem-costae parallellum quasi nervaturam palmatum aemulantibus nux elongato ovoideus acutis alae majoribus ob lanceolatis obtusis basim versus sensim attenuatis glabris alae minoribus elongato ovatis acutis.

Typus: Versteegh BW 4854 (L).

Tree, up to 28 m high, free bole 24 m, diam. 43 cm; buttresses up to 2 m high, out 1 m; bark brown, not fissured, rather strongly peeling; living bark brown or lightbrown; sapwood yellow or yellowish brown; heartwood yellowish brown or yellow. Branches smooth, glabrous; branchlets slender, densely, minutely adpressed stellate pilose. Leaves chartaceous to thickly chartaceous, glabrous, ovate-elliptic, $2.5 \times 6 - 4 \times 10$ cm, abruptly acuminate, acumen obtuse, up to 5 mm long, base contracted into the slender, up to 1 cm long, above slightly, narrowly canalicate petiole; upper surface smooth, midrib prominulous, ribs faint, prominulous; lower surface rather smooth, midrib prominent, lateral nerves ca 5 pairs, slender, erect-patent, rather straight, at about halfway the margin abruptly perpendicular and anastomosing with the former and next one, forming two pseudo-basal nerves, that reach up to the leaf tip, at the outside some more arcuate, faint nerves; secondary nerves dense, parallel, faint. Inflorescence unknown. Nut glabrous, elongate-ovoid, acute, up to 1 cm long. The two longest wings ob lanceolate, glabrous, obtuse, up to 4 cm long, the widest part 1 cm, 7–9 ribbed, reticulate, gradually narrowed at base; the short wings half, respectively $\frac{3}{4}$ the nut length, acute.

W. IRIAN: S.E. part, E. Digul, Iwur R., alt. 400 m, Agathis forest on clayey soil, ster., BW 8533 (L); along Digul R. near Wage, alt 15 m, Nov., fr., Versteegh BW 4854 (L): Muju Distr., Opka, 10 km N.E. of Ninati, alt. 50 m, BW 6441 (L); 5 km N. of Ninati, alt. 50 m, ster., BW 6430 (L).
STERCULIACEAE

Scaphium burkillii Kosterm., spec. nov.

Arbor magna ramulis crassis glabris lenticellatis foliis alternanti-bus glabris coriaceis ellipticis acuminatis basi rotundatis supra nitida laevia nervis primariis gracilibus prominulis subtus opaca dense prominule reticulata nervo mediano prominentibus costis prominentibus basaliis 2 vel 4, majoribus strictis usque ad $\frac{3}{4}$ foliorum lamina adscendentibus, minoribus arcuatissiis submarginalis costis caeteribus utrinque 3–4 suberectis curvatis marginem versus arcuatem evanescentibus; petiolis perlongis glabris; infructescentiis magnis vix ramosis perdense minutiissime stellato pilosis fructus coriaceis Scaphiformibus acutis extus laxe minutiissime stellato pilosis, intus pernitetidis griseis glabrescentibus semen globosum magnum.

Typus: Ilias Paie S 15575 (SING).

Large tree, 50 cm in diam.; branchlets cylindrical, stout, glabrous, glossy, grey, with tiny lenticles. Leaves spirally arranged, coriaceous, glabrous, elliptical, 11 x 24 — 12 x 37 cm, apex shortly acuminat, base rounded; upper surface glossy, smooth, main nerves filiformous, prominent; lower surface dull, densely, prominently reticulate, midrib prominent, basal nerves prominent, 2 pairs, the lower pair almost marginal, reaching 1/5 the blade length, the inner ones straight, reaching $\frac{3}{4}$ of the leaf length; lateral nerves 3–4 pairs, towards margin running out arcuatey. Petiole 16–21 cm long, glabrous, thickened at both ends, glabrous.

Infructescence hardly branched, up to 25 cm long, densely, minutely rusty stellate pilose; fruit boat-shaped, acute, up to 7 cm long and (opened) 2 cm wide, leathery; outside sparsely, minutely stellate hairy, inside glossy, grey, glabrescent; seed globose, 3 cm diam.; seedcoat 4 mm thick; peduncle thick, densely pilose, 5–7 mm l.

Outstanding by its leafshape, the thick, leathery capsules and the enormous thick-walled seed. As the tree was collected in a swampy area, one is tempted to ascribe the leathery fruit and the thick-walled seed to the conditions of water dispersal, as opposed to the other species of Scaphium where the paperthin capsules and light seed are wind dispersed.

The species is named after Mr. Humphrey M. Burkill, Director of the Botanic Garden, Singapore, under whose directorship the library and herbarium facilities have been greatly extended and improved and whose valuable cooperation to help the Herbarium Bogoriense in the difficult period of 1957 – 1967 is herewith gratefully acknowledged.

Plate I. Holo-type sheet of *Scaphium burkillii* Kosterm. deposited in the Singapore Herbarium, Accession No. 518135.
MONIMIACEAE

Steganthera suberoso-alata Kosterm., spec. nov.

Arbor parva vel mediocris ramis suberoso-alatis griseo albis ramulis minutissime laxe adpresse pilosis vel sublanuginosis foliis chartaceis ellipticis vel ovato-ellipticis obscure longe acuminati basi rotundatis supra glabra nervo mediano prominulo costis filiformibus subimpressis subtus pallidiora sparse minutissime (sub lente) sublanuginosa vel adpresso pilosis nervo mediano prominentibus costis utrinque 7–8 prominentibus arcuatis marginem versus arcuatim conjunctis rete laxe prominele petiolis incrassatis brevis dense minutissime adpresse pilosis vel sublanuginosis. Inflorescentiis rami vel caulifloris aggregatis dense minutissime griseo sublanuginosis alabastris semi-globosis adpresse pilosis pedicellis longis gracilis.

Typus: Hunt 2513 (K).

Tree or shrublike tree, 5–15 m high; branches with conspicuous grey-white corky wings. Branchlets minutely, rather sparsely (denser towards apex) sublanuginose or adpressed pilose. Leaves chartaceis, elliptical or ovate-elliptical, 4 × 18 — 8 × 27 cm, gradually acuminate, base rounded; upper surface glabrous, midrib prominent, ribs and secondary veins slightly impressed, lower surface paler with sparse adpressed or subadpressed, tiny hairs (denser on nerves), midrib prominent, lateral nerves 7–8 pairs, prominent, arcuate, near the margin arcuately anastomosing; reticulation lax, prominent. Petioles swollen, densely, minutely sublanuginose, up to 5 (~ 8) mm long. Inflorescences on old wood on accrescences or on the branches, fasciculate, up to 6 cm long, minutely, grey sublanuginose; flower buds semiglobose, sparsely, minutely adpressed pilose.

The species is characterized by the corky wings. There is a slight discrepancy in the tomentum, the type specimen has bent hairs (sublanuginose), in the other specimens the hairs on the branchlets and leaves are straight and adpressed. Vernac. name: U-uni-alakau.

SOLOMON ISLANDS: Kolombangara, alt. 800 m, open rainforest with much moss, Sept., buds, Hunt 2513 (K); Guadalcanal, E. slopes of Mt. Gallego, July, fr., Dennis 2142 (K), tree 10 m, carpel ellipsoid, smooth, 9 × 13 mm, stalk 3 × 3 mm, like the receptacle minutely, adpressed pilose; ibid., Popomanasiiu, Vunvulukama, alt. 1500 m, Oct., fr., Corner 151; fr. with yellow-ochre carpel stalks and receptacle; E. San Cristobal, 8–11 miles inland, alt. 500 m, Warahito R., July, fr., Whitmore 6229 (K), peduncles swollen, bright orange, receptacle 3 cm diam.; Santa Ysabel, Cockatoo Anchorage, forest on ultrabasic rock near sea, Sept., fl., Hunt 2617 (K).
MYRISTICACEAE

Myristica rumphii (Bl.) Kosterm., comb. nov.


The species is most likely conspecific with Myristica hollurongii Warb.