

A NEW SPECIES OF GNETUM FROM PAPUA NEW GUINEA (GNETACEAE)

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***Gnetum bosavicum* Markgraf, n.sp.**

Frutex alte (ad 20 m) scandens. Rami crasse lenticellosi, ramuli satis graciles. Folia coriacea, sicca nigricantia, supra laevia et nitida, elliptica, basi rotundato-angustata, apice breviter et obtuse acuminata, 8—12 × 3—5 cm, nervi laterales 5—6, valde arcuati, 10—15 mm inter se distantes, 3 mm ante marginem arcuato-coniuncti; petiolus 6—8 mm longus, gracilis. Fructescentia ramificata, crassa, magna. Colla infra convexa, supra inter fructus pulvinibus densis sed brevibus pilorum repleta. Fructus rubri, ellipsoidei, obtusi, sessiles, laeves, 5 × 3 × 3 cm; involucrium externum 2 mm crassum, carnosum et fibrosum, medium durum, 2 mm crassum, intimum chartaceum et modice fibrosum.

NEW GUINEA. East. Western Dist., Mt. Bosavi, northern side, 6 26 S 142 50 E, alt. 1000—1350 m, in mixed prim. for. on old well-drained volcanic soil, mostly on ridge, 23/25-9-1973, fr., M. Jacobs 8783, 9410 (Type, L).

Some species of the genus *Gnetum* exceed by especially large fruits: *G. venosum* Spruce of the Amazon River (7 cm), *G. klossii* Merr. and *G. raya* Markgr. in Borneo (5 cm), *G. loerzingii* Markgr. in Sumatra (4 cm), *G. ridleyi* Gamble (6 cm) and *G. globosum* Markgr. (4.5 cm) in Pahang (Malay Peninsula), *G. gnemonoides* Brongn., widespread in Malesia (6 cm), and now *G. bosavicum* Markgr. in New Guinea (5 cm). This species resembles most *G. ridleyi* Gamble; its fruits, however, are not turbinate but ellipsoid with rounded top and its leaves are apparently smaller and with a roundly narrowed, not cuneate base and a shorter petiole.

In the key published in *Flora Malesiana* I, 6(1972)944-947, it may be inserted with some small changes beneath *G. ridleyi*:

1*. Lianas. Leaves coriaceous, brown or black when dry. Inflorescence not yellowish. Collars dish-like. Fruit not velvety.

8. Inflorescence branched.

9*. Leaves broadest in or below the middle, not densely striate above.

10*. Leaves black when dry, secondary nerves in general indistinctly joining.

14. Leaves with conspicuous spicular cells, though not striate. Flowers embedded in numerous hairs. Fruit sessile, large (5—6 cm), ellipsoid or obtusely turbinate.

14a. Leaf blades large, up to 18 × 9 cm, cuneate at the base, secondary nerves straight, directed forward, indistinctly joining, petiole 1.5 cm. Fruit obtusely turbinate, 6 × 2.5 × 2.5 cm.

9. *G. ridleyi*

14a*. Leaf blades smaller, up to 12 × 5 cm, narrowly rounded at the base, secondary nerves bent, spreading, distinctly joining, petiole 6—8 mm. Fruit ellipsoid, rounded, 5 × 3 × 3 cm.

9a. *G. bosavicum*