

TWO NEW GENERA OF ANT SUBFAMILIES DORYLINAE AND PONERINAE (HYMENOPTERA: FORMICIDAE) FROM YUNNAN, CHINA

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Abstract: Two new genera of the ant subfamilies Dorylinae and Ponerinae are collected and described from the tropical rain forest of Xishuangbanna Nature Reserve, Yunnan Province, China. *Yunodorylus* gen. nov. belongs to the subfamily Dorylinae, which is monotypic and terrestrial with 2 colonies of the species *Y. sexspinus* sp. nov. collected from the soil sample of seasonal rain forest and deciduous monsoon forest. *Bannapone* gen. nov. belongs to the tribe Amblyoponini of Ponerinae, which is also monotypic and known only from a dealate female of the species *B. mulanae* sp. nov. collected from a soil sample in semi-evergreen monsoon forest.

Key words: Hymenoptera; Formicidae; *Yunodorylus* gen. nov.; *Bannapone* gen. nov.; China

Two new genera of the ant family Formicidae are described from the tropical rain forest of Xishuangbanna Nature Reserve in Southern Yunnan Province. *Yunodorylus* gen. nov. belongs to the subfamily Dorylinae based on the following characters: workers are polymorphic, head is roughly rectangular, eyes and ocelli are absent, dorsum of alitrunk is relatively flat, waist has only 1 pedicel, gaster large and relatively depressed (Bolton, 1994). It is the second genus found in the subfamily (Bolton, 1995). Only 1 species of the new genus is known, which constructs nests in the soil and was found in the virgin seasonal rain forest and slightly disturbed deciduous monsoon forest.

Bannapone gen. nov. belongs to the tribe Amblyoponini of the subfamily Ponerinae based on the following characters: body with a single petiole between alitrunk and gaster, sting present at apex of gaster and functional, pygidium and hypopygidium both unarmed, pretarsal claws simple, propodeum lacks spines, labrum without peg-like teeth, and petiole broadly attached to first gastral segment (Bolton, 1994). The new genus

becomes the 5th living genus of the tribe in Oriental and Indo-Australian Regions and known only from a dealate female collected from a soil sample in semi-evergreen monsoon forest.

Standard measurements and indices are as defined by Bolton (1975): TL = Total length, HL = Head length, HW = Head width, CI = Cephalic index = $HW \times 100/HL$, SL = Scape length, SI = Scape index = $SL \times 100/HW$, PW = Pronotal width, AL = Alitrunk length, ED = Maximum diameter of eye, ML = Mandibular length, PL = Petiole length, PH = Petiole height, DPW = Dorsal petiole width, LPI = Lateral petiole index = $PH \times 100/PL$, DPI = $DPW \times 100/PL$. All measurements are expressed in millimeters.

The type specimens are deposited in the Insect Collection, Faculty of Resources, Southwest Forestry College, Kunming, Yunnan Province, P. R. China.

Yunodorylus gen. nov. (Figs. 1-5)

Diagnosis of worker: Weakly polymorphic and terrestrial. Palpi formula 2, 2 (3 individuals dissected).

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