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**Revision of the Neotropical caddisfly genus *Phylloicus*
(Trichoptera: Calamoceratidae)**

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ABSTRACT

Systematics of the genus *Phylloicus* are reviewed. Illustrations, a generic diagnosis, and descriptions are provided for males and females. 61 nominal species are recognized, of which 26 are newly described: *P. adamsae* (Peru), *amazonas* (Brazil, Peru, Venezuela), *auratus* (Peru), *bertioga* (Brazil), *bicarinatus* (Peru), *bidigitatus* (Brazil), *blahniki* (Costa Rica), *cordatus* (Venezuela), *cressae* (Venezuela), *elektoros* (Brazil, Venezuela), *ephippium* (Ecuador), *flinti* (Peru), *holzenthali* (Venezuela), *llaviuco* (Ecuador), *munozii* (Costa Rica), *panamensis* (Panama), *paprockii* (Brazil), *passulatus* (Venezuela), *paucartambo* (Peru), *perija* (Venezuela), *pirapo* (Paraguay), *quadridigitatus* (Brazil), *quitacalzon* (Peru), *spinulacolis* (Venezuela), *trichothylax* (Ecuador), and *yolandae* (Brazil). *Phylloicus ornatus* (Banks) and *P. centralis* (Navás) are designated as junior synonyms of *P. aeneus*; *P. priapululus* Denning and Hogue is designated a junior synonym of *P. lituratus*; and *P. latus* (Navás) and *P. sagittosa* (Ross) are designated as junior synonyms of *P. nigripennis*. *Phylloicus crenatus* Navás, *P. medius* Müller and *P. tricalcaratus* (Ulmer) are considered *nomina dubia*. Lectotypes are designated for *P. bromeliarum*, *P. major*, and *P. spectabilis*. A neotype is designated for *P. abdominalis*.

Key words: Trichoptera, Calamoceratidae, *Phylloicus*, caddisfly, Neotropical, taxonomy, systematics

INTRODUCTION

The Calamoceratidae are a cosmopolitan family of 8 extant genera, 1 fossil genus, and over 100 described species (Morse 2001). Two endemic genera occur in the Neotropics, *Banyallarga* Navás, 1916 and *Phylloicus* Müller, 1880a. *Phylloicus*, with 28 described species, is the largest calamoceratid genus in the New World. Species are distributed throughout Latin America, including the Antilles, but are especially diverse in Brazil, Peru, and Venezuela. The ranges of two species, *P. aeneus* (Hagen) and *P. mexicanus* (Banks), include Texas and Arizona, respectively.

The adults of many *Phylloicus* species are active during the day, unlike many caddisflies, and are less frequently encountered at light traps. Adults of many species are brightly or dramatically colored, with bold patterns formed by white, gold, and orange setae, or by clear, sometimes iridescent membrane. These wing patterns are diagnostic; therefore, adults of *Phylloicus* should be collected in clean, dry cyanide jars, handled carefully to avoid rubbing off wing hairs, and mounted on pins. Specimens preserved in fluid quickly lose setae and pigmentation, and are thus more difficult to identify. Teneral adults are often collected; if possible, they should be allowed to complete tanning before being killed.

Phylloicus larvae are found in slow currents or in pools, and one species, *P. bromeliarum*, inhabits bromeliad tanks (Müller 1880a). Cases and larvae have been described by Ulmer (1955, *P. bromeliarum*), Flint (1968a, *P. monticolus*; 1968b, *P. farri*), Botosaneanu & Sykora (1973, *P. cubanus*), Botosaneanu & Flint (1982, *P. hansonii*, as *angustior*), Wiggins (1996a, *P. mexicanus*, as *aeneus*), and Bowles & Flint (1997, *P. aeneus*, as *ornatus*).