

First Central American record of *Clystopenella longiventris* (Hymenoptera: Scolebythidae) with comments on the variation of the species

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Abstract

CAMBRA RA, OLIVEIRA A C. 2003. First Central American record of *Clystopenella longiventris* (Hymenoptera: Scolebythidae) with comments on the variation of the species. Entomotropica 18(2):147-148.

Clystopenella longiventris Kieffer (Scolebythidae) was previously known from Brazil. Females of *C. longiventris* from Costa Rica and Panama were studied. This constitutes the first record of this species from Central America and the family from Panama. We here recognize and discuss intraspecific differences between the Brazilian and the Central American specimens.

Additional key words: Costa Rica, chrysidoid wasp, geographic distribution, Panama.

Resumen

CAMBRA RA, OLIVEIRA A C. 2003. Primer reporte para América Central de *Clystopenella longiventris* (Hymenoptera: Scolebythidae) con comentarios sobre variaciones de las especies. Entomotropica 18(2):147-148.

Clystopenella longiventris Kieffer (Scolebythidae) era previamente conocida para Brasil. Hembras de *C. longiventris* de Costa Rica y Panamá fueron estudiadas. En este trabajo se cita por primera vez a esta especie para América Central y la familia para Panamá. Se reconocen y discuten las diferencias intraespecíficas entre los especímenes de Brasil y América Central.

Palabras clave adicionales: Avispa, Costa Rica, distribución geográfica, Panamá.

The Scolebythidae is a very rarely collected group of chrysidoid wasps, with six genera, four extant species and three species known only from fossil amber (Azevedo 1999; Lacau et al. 2000). Two genera are known from neotropics: *Clystopenella* Kieffer, 1911 and *Dominibythus* Prentice, Poinar & Milki, 1996.

The monotypic genus *Clystopenella* was initially placed in the subfamily Bethylinae of the Bethyilidae. According to Evans (1963) the wings of *Clystopenella* resemble those of certain genera of that subfamily, especially *Eupsenella*. *Clystopenella* was transferred to the Scolebythidae by Evans in 1963 when he created the family. *Clystopenella longiventris* Kieffer, 1911 is known from a total of 19 females and two males, collected between 13 and 27 degrees of latitude South in the States of Bahia, Minas Gerais, Distrito Federal, Mato Grosso and Santa Catarina (Evans 1963, 1966; Day 1977; Azevedo 1999). Gauld (1995) reported the family Scolebythidae for first time from Costa Rica based on female specimens of one, or possibly two, undescribed species of *Clystopenella*.

The senior author examined nine females from Panama and three females from Costa Rica of *Clystopenella*. These twelve specimens were sent to Azevedo, to be compared with specimens of *C. longiventris* from Brazil. Azevedo did not find any morphological differences between the Central American and the Brazilian specimens. We here report *C. longiventris* from Costa Rica and Panama, representing the first record of this species from Central America and the family from Panama

Materials and Methods

Material examined: COSTA RICA, Limón, 1 female, Valle La Estrella, 100 m, vii.1994, R.B. Hitoy Cerere, A. C. Amistad col. M. Segura col. (INBio); 1 female, Sector Cerro Cocori, Finca de E. Rojas, 100m, 22.iii-19.iv.1993, Malaise trap, E. Rojas col. (INBio); *Guanacaste*, 1 female, Est. Las Pailas, P. N. Rincón de la Vieja, 800 m, 16-30.vi.1994, Malaise trap, D. G. García col. (INBio); PANAMA, Darién, Parque Nacional Darién: 6 females, Estación Cruce de Mono, 6.ii-4.iii.1993, R. Cambra, J. Coronado col. (4 in MIUP; 2 in Universidade Federal do Espírito Santo); 3

females, Est. Rancho Frio, 80 m, 16.xi.2000-17.i.2001, R. Cambra, A. Santos col. (2 in MIUP; 1 in UFES).

Results and Discussion

C. longiventris was described as having a black head with three distinctive brownish streaks on the vertex, but Azevedo (1999) found that the lighter streaks were very weak or nearly absent in some specimens. The most conspicuous difference in the Central American specimens is that in the majority, the light streaks on the vertex are absent. This difference is not sufficient to recognize them as a new species, especially because a few specimens from Brazil (Azevedo 1999) and Central America have very weak streaks on the vertex. The Brazilian and Central American specimens are very similar in size (7 to 10 mm body length) and morphology (clypeus, mandibles, head profile, notauli, parapsidal furrows and metasomal sternites).

Gauld (1995) mentioned that the large series of "specimens [more than 100] were females (...) collected in Malaise traps operated at low altitudes, many from rather disturbed habitats or seasonally dry forest, but a few from undisturbed wet forests." All the specimens from Panama were females collected in Malaise traps in the wet forests of Parque Nacional Darién, at altitudes below 80 m above sea level. Sampling in other areas of Panama during the last nine years, with Malaise and yellow traps and manually, have not produced additional specimens. Only two male specimens of *C. longiventris* are known (Evans 1966, Day 1977). Two possible explanations for the absence of males of *Clystopenella* in six continuous years of Malaise samplings in Costa Rica are thelytokous parthenogenesis (females that produce only females without any participation of males) or special behavior of the males (staying inside the tunnels in which they presumably have developed) (Gauld 1995). We are more inclined to consider the second alternative as the correct one.

The disjunct distribution of *C. longiventris* (Brazil, Costa Rica and eastern Panama) is possibly an artifact determined by not examination of specimens from museums of others countries between Panama and Brazil. The only other scolebythid species known to have disjunct populations is *Ycaploca evansi* Nagy, 1975, from Pretoria, South Africa (a reared series of 16 females and 23 males) (Day 1977), and Queensland, Australia (only females).

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