

<https://doi.org/10.11646/zootaxa.4497.2.2>  
<http://zoobank.org/urn:lsid:zoobank.org:pub:049C335B-0A00-422B-9D5A-8B5365099BEE>

## The presence of the family Anostostomatidae (Orthoptera: Ensifera) in Argentina

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### Introduction

The family Anostostomatidae comprises about 250 known species of robust insects, similar to crickets, which are widely distributed predominantly in the southern hemisphere. They are divided into eight subfamilies, of which five occur in the Neotropics (Cadena-Castañeda & Cortés-Torres 2013). While there are six species described from central and southern Chile (three in each of the genera *Cratomelus* and *Leiomelus*), the only published record of the Anostostomatidae for Argentina refers to two old specimens of *Apotetamenus clipeatus* in the collection of the Muséum National d'Historie Naturelle in Paris (Griffini 1912, Karny 1935, Cadena-Castañeda & Cortés-Torres 2013).

The genus in question belongs to the Lutosinae, a subfamily that comprises 7 genera, of which 4 are distributed in South America (*Apotetamenus* Brunner von Wattenwyl, 1888, *Hydrolutus* Issa & Jaffe, 1999, *Lutosa* Walker, 1869, and *Neolutosa* Gorochov, 2001).

*Apotetamenus* is a small genus, represented by three species. It originally comprised *Apotetamenus amazonae* from Peru (subsequently designated type species) and *A. clipeatus* from Brazil. Later was also included *Licodia politus* Bruner, 1915, also from Brazil (Karny 1937), which was then synonymized with *A. clipeatus* (Cadena-Castañeda & Cortés-Torres 2013, providing a redescription). Recently *Apotetamenus gorochovi* Cadena-Castañeda & Cortés-Torres, 2013 was described from Colombia.

Apart from Brazil, *A. clipeatus* was recorded from Bolivia (Bruner 1915, Cadena-Castañeda & Cortés-Torres 2013), and, as already mentioned, Argentina.

*Lutosa*, the type genus of the subfamily, comprises 13 Central and South American species, of which 8 are distributed only in the southern part of the continent. Here is presented the first record for Argentina.

Finally, we report the presence of *Cratomelus* (Cratomelinae) from the Argentinean side of the Andes.

### *Apotetamenus clipeatus* Brunner von Wattenwyl, 1888

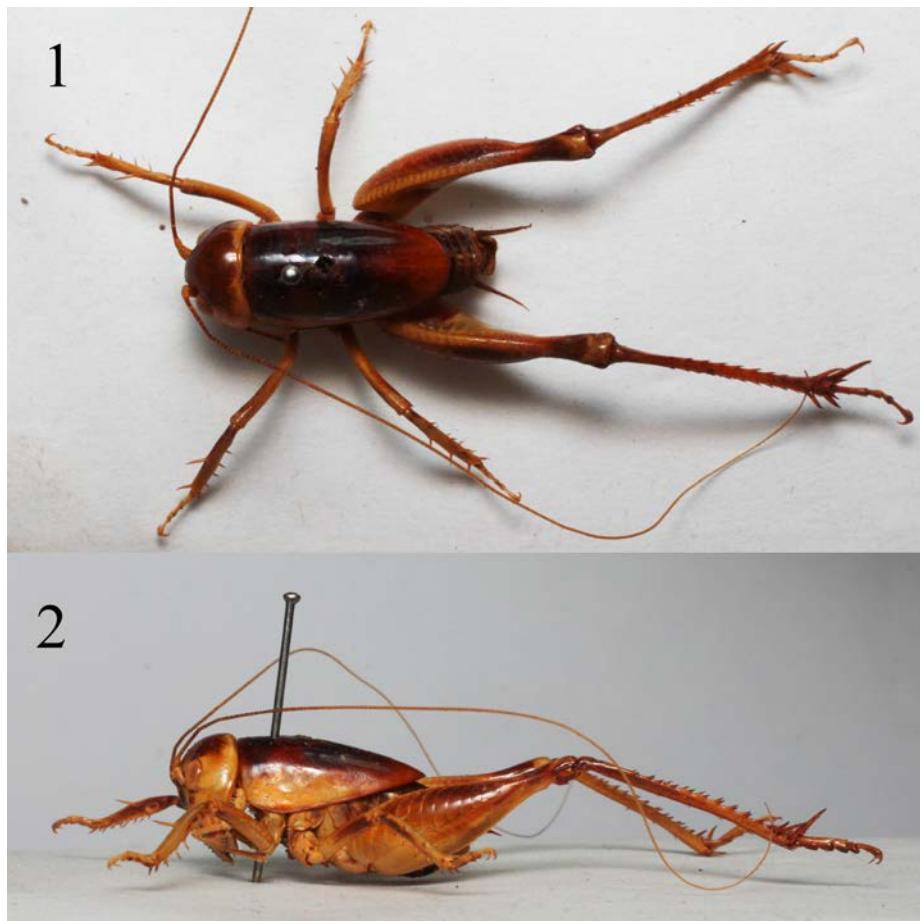
(Figs. 1–5; distribution 10)

**Examined specimens.** ARGENTINA: 1♂ Chaco, San Bernardo, O. Di Iorio leg., 27-X-1978, collection of G. Zubáran, San Miguel, Buenos Aires; 1♀ “Gran Chaco, Bords du rio Tapenaga, Colonia Florencia”, E. R. Wagner leg. 1903, Muséum National d'Historie Naturelle, Paris (MNHN)[from photos]; BRAZIL: 2♀♀ syntypes, approximate locality unknown, J. Hofmann leg. 1871, Staatliches Museum für Naturkunde Stuttgart (photos in OSF).

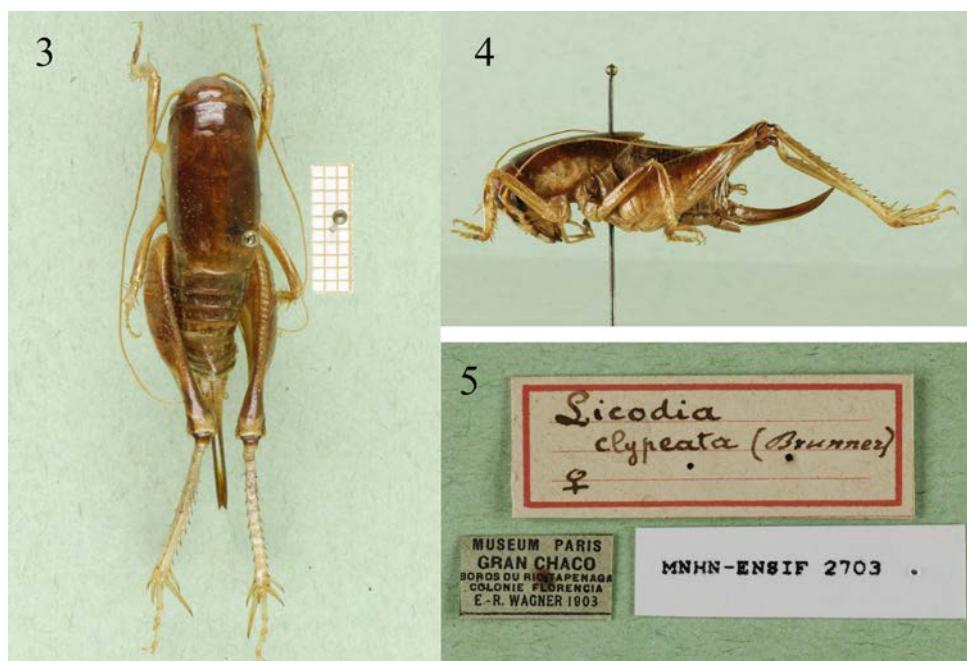
**Distribution.** From eastern Bolivia and southern Brazil (records from Mato Grosso and Minas Gerais) to northeast of Argentina (Santiago del Estero, Chaco and Santa Fe).

**Notes.** The locality Colonia Florencia (specimen in Paris) is in the north of the Province of Santa Fe, very close to the border with the Province of Chaco. Río Tapenagá is a tributary of the Paraná River and crosses both provinces. The second old specimen from Argentina (Griffini 1912, Karny 1935) was collected in the same year

about 360 km west-southwest, in the Province of Santiago del Estero, on the banks of Río Salado near Icano (“Chaco del Santiago del Estero, Bords du Rio Salado, env. d’Icano”, E.R. Wagner leg. 1903, not in MNHN database).



**FIGURES 1–2.** *Apotetamenus clipeatus* ♂: Fig. 1 dorsal view; Fig. 2 lateral view.



**FIGURES 3–5.** *Apotetamenus clipeatus* ♀: Fig. 3 dorsal view; Fig. 4 lateral view; Fig. 5 labels *Apotetamenus clipeatus* (MNHN).

***Lutosa surda* Gorochov, 2001**

(Figs 6, 7; distribution 10)

**Examined specimens.** ARGENTINA: 1♀ Misiones, Departamento Oberá, Villa Bonita, L. Aguado leg. 14–18-I-2018, collection of G. Zubaran, San Miguel, Buenos Aires.

**Distribution.** Known from two sites in southeastern Paraguay and northeast of Argentina.

**Notes.** The new locality is less than 150 km southeast of the type locality Puerto Bertoni, a small village on the Paraguayan side of the Paraná River (across from Puerto Iguazú). The unique female type was found in December 1914 under a stone (Gorochov 2001). The male, which would be necessary to confirm the generic affiliation, is still unknown.

6



7

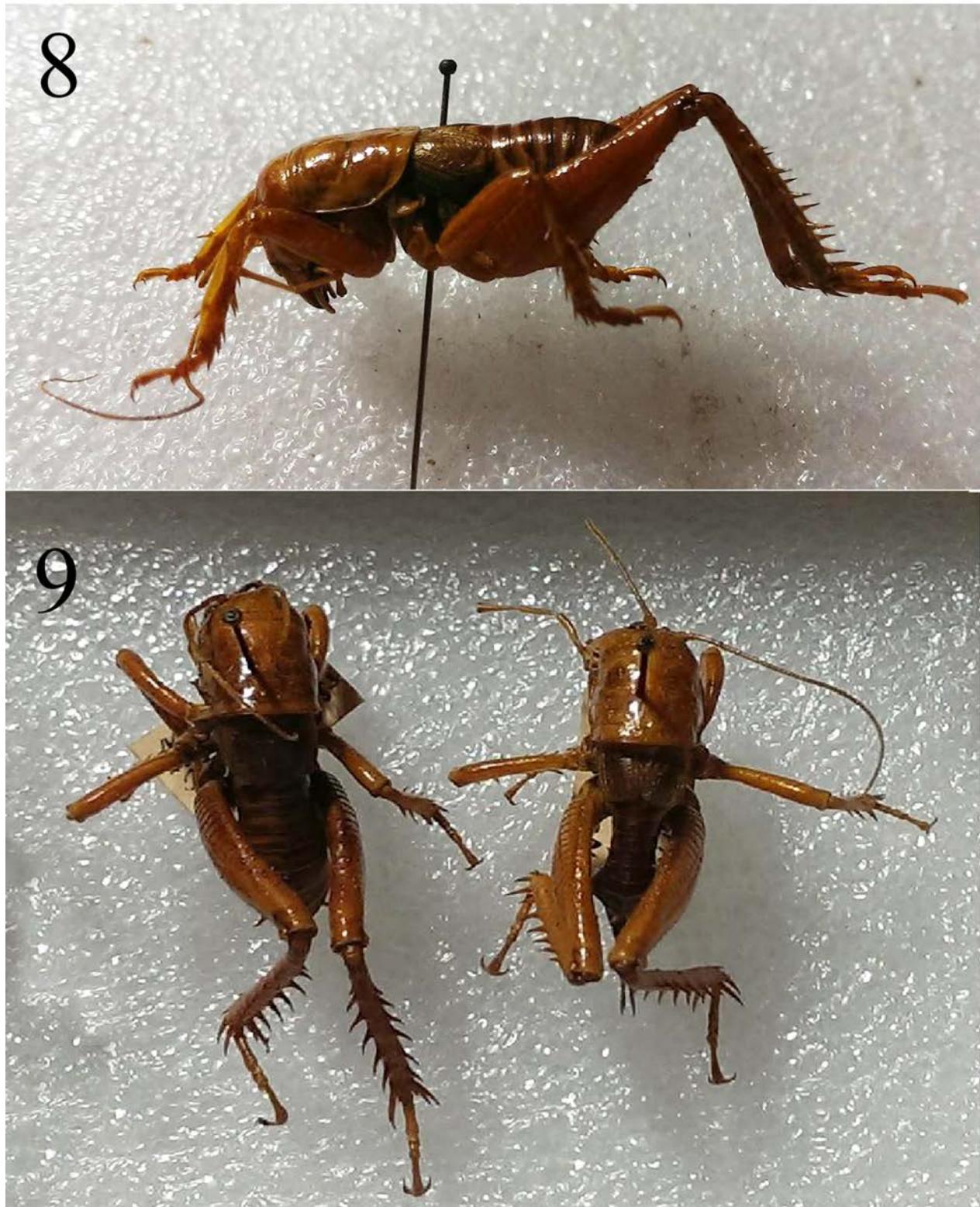


**FIGURES 6–7.** *Lutosa surda* ♀: Fig. 6 dorsal view; Fig. 7 lateral view.

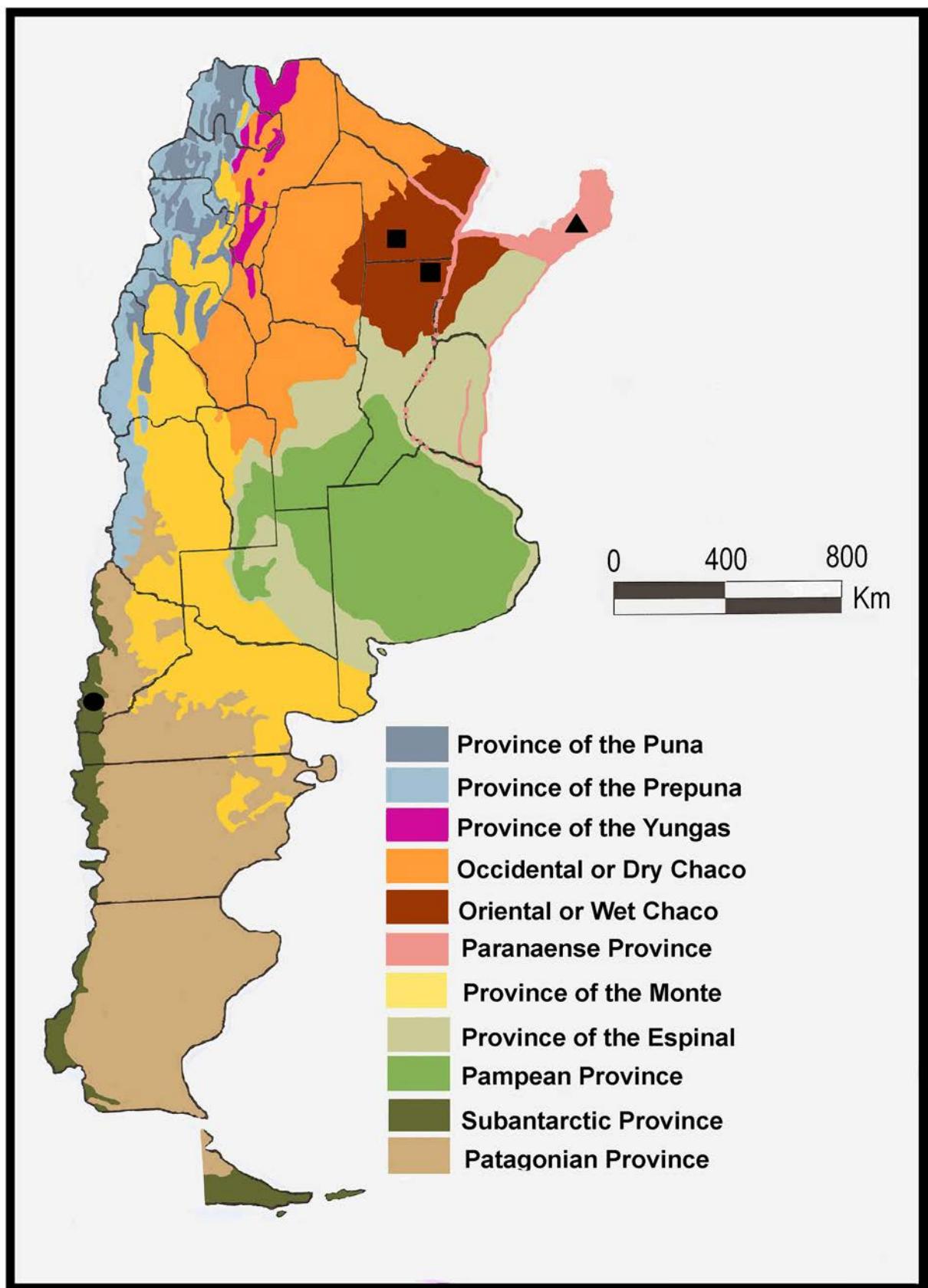
***Cratomelus armatus* Blanchard, 1851**

(Figs. 8–9; distribution 10)

**Examined specimens.** ARGENTINA: 1♂ Neuquén, Pucará, Fritz leg. I-1973; 1♂ 1♀ Lago Lacar, Pucará, III-1953, (collector name undecipherable), collection of Museo Argentino de Ciencias Naturales “Bernardino Rivadavia”, Ciudad Autónoma de Buenos Aires (MACN).



**FIGURES 8–9.** *Cratomelus armatus*: Fig. 8 lateral view ♂; Fig. 9 dorsal view ♂♀ (MACN).



**FIGURE 10.** Distribution in Argentina: *A. clipeatus*, squares ; *L. surda*, triangle; *C. armatus*, circles.

**Distribution.** South Central Chile and adjacent Argentinean Andes.

**Notes.** Elgueta *et al.* (1999) mention occurrence in Neuquén of this species, without precise locality data and source. Alfaro *et al.* (2015) give a more up-to-date distribution of the species in Chile, showing closeness of the corresponding localities to Argentina.

## Concluding remarks

As perhaps could be expected, members of the genus *Cratomelus*, distributed along the Chilean part of the Andes, occur also on the Argentinean side. The mostly ignored old records of *Apotetamenus clipeatus*, and the new records of this species as well as of *Lutosa surda*, indicate that also the distribution of the Lutosinae extends southward to well across northern Argentina. Further investigation and fieldwork directed to find these little-known nocturnal insects would certainly yield more individuals and complete their real distribution areas.

## Acknowledgements

We thank Laure Desutter-Grandcolas (Muséum National d'Historie Naturelle, Paris) for permission to use photos of the specimen of *A. clipeatus* from Argentina and Andrej Gorochov for the help with the identification of *L. surda*. We also thank Leonardo Aguado, who provided the specimen of *L. surda*, as well as Joanna Rodríguez-Ramírez and Arturo Roig (Museo de Ciencias Naturales “Bernardino Rivadavia”) for information and photos regarding the *Cratomelus* specimens.

## References

- Alfaro, F.M., Zuñiga-Reinoso, A., Muñoz-Ramírez, C. & Elgueta, M. (2015) New records reveal the actual distribution of *Cratomelus meritus* Gorochov (Orthoptera: Anostostomatidae), a giant red cricket from Chile. *Neotropical Entomology*, 44, 194–196.  
<https://doi.org/10.1007/s13744-015-0270-0>
- Brown, A., Martínez Ortiz, U., Acerbi, M. & Corcuera, J. (Eds.) (2006) *La Situación Ambiental Argentina 2005, Fundación Vida Silvestre Argentina*, Buenos Aires, 587 pp.
- Bruner, L. (1915) Notes on tropical American Tettigonoidea (Locustodea). *Annals of the Carnegie Museum*, 9, 284–404.
- Brunner von Wattenwyl, C. (1888) Monographie der Stenopelmatiden und Gryllacriden. *Verhandlungen der zoologisch-botanischen Gesellschaft in Wien*, 38, 247–394.
- Cadena-Castañeda, O.J. & Cortés-Torres, C. (2013) New species and taxonomic rearrangements of Anostostomatid Crickets (Orthoptera: Stenopelmoidea: Anostostomatidae) from the Neotropics. *Zootaxa*, 3664 (3), 335–348.  
<http://dx.doi.org/10.11646/zootaxa.3664.3.4>
- Cigliano, M.M., Braun, H., Eades, D.C. & Otte, D. (2018) *Orthoptera Species File Online*. Version 5.0/5.0. Available from: <http://Orthoptera.SpeciesFile.org> (accessed 31 July 2018)
- Elgueta, M., Camousseight, A. & Carbonell, C.S. (1999) Catálogo de Orthoptera (Insecta) de Chile. *Publicación Ocacional del Museo Nacional de Historia Natural (Chile)*, 54, 5–60.
- Gorochov, A.V. (2001) New taxa of Anostostomatidae and Prophalangopsidae (Orthoptera). *Zoosystematica Rossica*, 2000 (2001), 9 (2), 299–315.
- Griffini, A. (1912) Intorno ad alcuni Stenopelmatidi del Museum d'Historie Naturelle di Parigi. *Bollettino dei Musei di Zoologia ed Anatomia Comparata della R. Università di Torino*, 27 (622), 1–12.
- Holstein J. & Ingrisch, S. (2004) Catalogue of type specimens of Orthoptera (Insecta) deposited in the Staatliches Museum für Naturkunde in Stuttgart. Part 1: Ensifera. *Stuttgarter Beiträge zur Naturkunde, Serie A (Biologie)*, 665, 1–33.
- Karny, H.H. (1929) Revision der Gryllacriden des Naturhistorischen Museums in Wien einschließlich der Collection Brunner v. Wattenwyl. 1. Hälfte. *Annalen des Naturhistorischen Museums in Wien*, 43, 3–186.
- Karny, H.H. (1935) Die Gryllacrididen des Pariser Museums und der Collection L. Chopard. *Eos, Revista española de Entomología*, 10 (3–4), 293–393.
- Kirby, W.F. (1906) Orthoptera Saltatoria. Part I. (Achetidae et Phasgonuridae). *A Synonymic Catalogue of Orthoptera (Orthoptera Saltatoria, Locustidae vel Acridoidea)*, 2, 1–562.