

Article



Redescription of the grassland leafhopper genus Doraturopsis Lindberg (Hemiptera: Cicadellidae: Deltocephalinae: Chiasmini) with description of a new genus and species from China

YANI DUAN^{1, 2} & YALIN ZHANG^{2, 3}

¹School of Plant Protection, Anhui Agricultural University, Hefei, Anhui Province 230036, China

²Key Laboratory of Plant Protection Resources and Pest Management of Ministry of Education, Entomological Museum, Northwest A & F University, Yangling, Shaanxi Province 712100, China

Abstract

The deltocephaline leafhopper genus *Doraturopsis* Lindberg (Hemiptera: Cicadellidae: Deltocephalinae: Chiasmini) and species D. heros (Melichar) are redescribed, and a new genus and species Zahniserius cylindricus, gen. n., sp. n. from China, with an aedeagus similar to that of *Doraturopsis*, are described. Keys are provided to separate the genera of Chinese Chiasmini Distant and two species of *Doraturopsis*.

Key words: Homoptera, Auchenorrhyncha, morphology, taxonomy, new genus, new species

Introduction

The tribe Chiasmini Distant belongs to the largest leafhopper subfamily Deltocephalinae sensu lato (Zahniser & Dietrich, 2010). This moderately large tribe, whose members are predominantly brachypterous and feed almost exclusively on grasses, was redefined by Zahniser (2008). Members of the tribe can be recognised by the following combination of characters: 1) small to medium sized; 2) pygofer basolateral cleft often absent or not membranous; 3) aedeagus often hinged, with basal part articulated to shaft (Fig. 1H); 4) ovipositor usually strongly protruding beyond pygofer (Plate I: D); 5) female pygofer often with few (<10) macrosetae; 6) first valvula relatively straight with dorsal sculpturing maculose to granulose and usually submarginal at least apically, without distinctly delimited apicoventral sculpturing (Plate II: F); 7) second valvula with distinct obliquely triangular, often serrated, dorsal teeth on apical 1/3 to 2/3 (Plate I: H). For more detailed diagnosis see Zahniser (2008).

In China the following genera of Chiasmini are present: Aconurella Ribaut, Chiasmus Mulsant & Rey, Doratura Sahlberg, Doraturopsis Lindberg, Exitianus Ball, Gurawa Distant, Leofa (Prasutagus) Distant and Nephotettix Matsumura. Of these, Leofa (Prasutagus) was revised by Duan et al. (2009) and Aconurella, Chiasmus, Doratura, Exitianus, Gurawa and Nephotettix are being revised (Duan & Zhang, in prep.). During these ongoing studies on this tribe in China, a new genus and species were identified with a similar aedeagus to *Doraturopsis* but dissimilar in many other respects. New descriptions and figures are provided for both genera and species, together with a key to separate genera of Chinese Chiasmini and the two species of *Doraturopsis*.

Type specimens and other materials examined are deposited in the Entomological Museum of Northwest A & F University (NWAFU) and China Agricultural University (CAU). Morphological terminology follows Oman (1949) and Zhang (1990).

³Corresponding author. E-mail: yalinzh@nwsuaf.edu.cn