



Two new species of *Acroceratitis* Hendel (Diptera: Tephritidae) and an updated key for the species from India

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Abstract

Two new species of genus *Acroceratitis* Hendel, namely *A. parastriata* David & Hancock, **sp. nov.** and *A. breviscapa* David, Ramani & Hancock, **sp. nov.**, are described from India. *A. histrionica* (de Meijere) is recorded for the first time from India. An updated key to Indian species of *Acroceratitis* is also provided.

Key words: Tephritidae, Gastrozonini, Poaceae, India, Karnataka

Introduction

Acroceratitis Hendel belongs to the bamboo and grass-feeding tribe Gastrozonini of subfamily Dacinae (Hancock and Drew, 1999; Kovac *et al.*, 2006). Dohm *et al.* (2014) studied the biology and host use patterns of Gastrozonini, including seven species of *Acroceratitis*, most of them reared from dead or felled shoots of the bamboos *Bambusa polymorpha* Munro, *Dendrocalamus strictus* (Roxburgh), *D. pendulus* Ridley, *Gigantochloa scortechinii* Gamble and *Melocalamus compactiflorus* (Kurz) Benth (Poaceae: Bambusoideae). The Gastrozonini are considered to be a monophyletic tribe with 141 described species placed in 25 genera (Kovac *et al.*, 2006; Wang and Chen, 2002; De Meyer, 2006; Hancock, 2008; Hancock and Marshall, 2012). Of the fifteen *Acroceratitis* species known so far (Hancock and Drew, 1999), seven have been reported previously from India (Agarwal and Sueyoshi, 2005; David and Ramani, 2011). Two new species are described here, together with a new record and an updated key for all the species of *Acroceratitis* now known from India.

Material and methods

Specimens deposited in National Bureau of Agricultural Insect Resources, Bangalore, India (NBAIR) were studied. Specimens were collected from Bangalore and Madikeri (Karnataka, India) by luring the flies to chopped tender bamboo shoots kept near the base of the bamboo thickets. Images of the specimens were taken using Leica DFC 420 camera mounted on Leica M205A stereozoom microscope; images of genitalia were acquired using Leica DFC 425 mounted on Leica DMLB 100S; the images were stacked and combined to a single image using Combine ZP (Hadley, 2011). Terminology adopted here follows White *et al.* (1999).

Systematics

Genus *Acroceratitis* Hendel

Acroceratitis Hendel, 1913: 82. Type species *Acroceratitis plumosa* Hendel, by original designation.