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Two new species of the genus *Antinia* PASCOE, 1871 from China (Coleoptera: Curculionidae: Entiminae)

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ABSTRACT. *Antinia kadeji* n. sp. and *A. szelagowiczi* n. sp. from China are described and figured. Catalogue of all known species of the genus *Antinia* is provided.

Key words: entomology, taxonomy, new species, Coleoptera, Curculionidae, Entiminae, *Antinia*, China

INTRODUCTION

The genus *Antinia* PASCOE, 1871 contains 9 known species, occurring exclusively in the Oriental Region. Revision of the genus and historical account of previous studies has been published by KANIA & DĄBROWSKA (1995). Since that time several papers, containing descriptions of new species, appeared (KANIA & STOJCZEW 2001, KANIA 2003 and KOJIMA & IDRIS 2003). Herein, as a “working hypothesis”, we have divided the referred species into two groups corresponding to the nominal genera *Antinia* PASCOE, 1871 and *Dermatodina* FAUST, 1895 (see the catalogue), the latter considered synonymous with *Antinia* by EMDEN and EMDEN (1939). In our opinion the species included in the “eupleura-group”, notwithstanding the lack of humeral tubercles, show great similarity to *Dermatodes* SCHÖNHERR, 1840 and *Dermatoxenus* MARSHALL, 1916. The present state of knowledge does not allow to decide whether these groups should be considered separate genera or what other rank would be appropriate.

In this paper we describe further two new species of the “*vitiosa*-group” from China: *A. kadeji* n. sp. and *A. szelagowiczi* n. sp.

***Antinia kadeji* n. sp.**

(Figs. 1, 2, 5, 11)

ETYMOLOGY

We dedicate this species to our friend, specialist in Dermestidae, Marcin KADEJ (Wrocław, Poland).

DIAGNOSIS

Strongly resembles to *Antinia holynskiorum* KANIA & STOJCZEW. Despite general similarity, *A. kadeji* differs from *A. holynskiorum* in structure of head, pronotum and genitalia. In *A. kadeji* sp. nov. front is distinctly wider and flatter, while median frontal sulcus, transverse furrow separating head from rostrum, and triangular depression at apex of rostrum besides epinotum are more finely marked than in *A. holynskiorum*. Pronotum in *A. kadeji* is feebly rounded on sides, without distinct carinae seen on outline in *A. holynskiorum* (Figs 10, 11).

DESCRIPTION

Length of body: 5.50 mm; width of body: 3.05 mm.

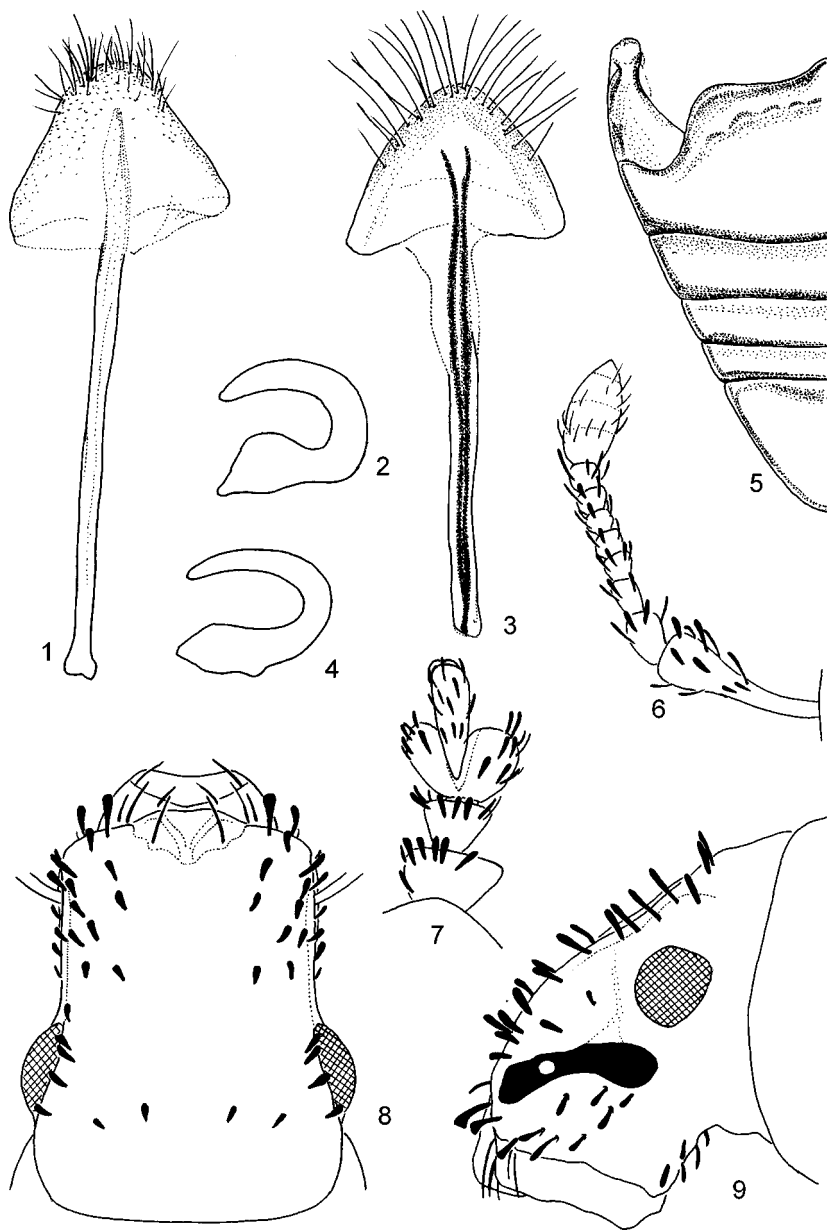
Body pyriform, black, only base of antennal scape brown, elytra almost globular.

Distribution of recumbent and erect scales on body generally like in *Antinia holynskiorum*, but exact comparison is not possible because in *A. kadeji* scales have been partly (especially on pronotum and anterior half of elytra) lost. Elytra covered with pale- to dark-brown scales, darker transverse band behind midlength finely marked, extends from 1. to 5. interstria like in *A. holynskiorum*.

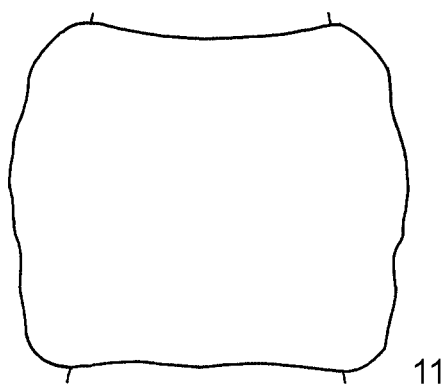
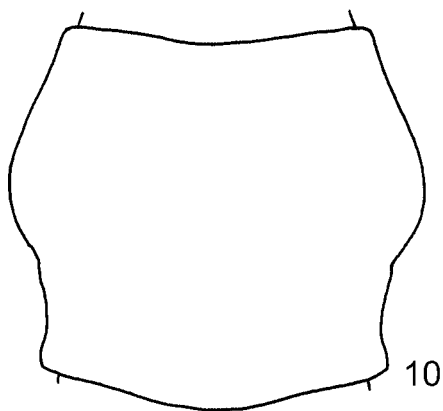
Head behind eyes parallelsided, separated from rostrum by straight, narrow, not too deep transverse furrow. Median sulcus of front extends from transverse furrow to behind posterior margin of eyes. It is narrow and shallow, deepest posteriorly, divides front into two slightly convex (distinctly flatter than in *A. holynskiorum*) lobes. Rostrum conspicuously widened anterad, at base $1.20\times$ wider than long, $1.08\times$ wider at apex than at base. Costae on rostrum hardly discernible. Antennal grooves not visible from above, while seen from sides they do not differ in shape from those in *A. holynskiorum*. Eyes unevenly convex, more protruding from outline of head than in the compared species.

Pronotum small in relation to elytra, dorsally feebly convex, slightly unevenly widened in outline, widest before midlength, $1.20\times$ wider than long. Anterior margin slightly emarginated at middle, posterior straight. Sculpture of pronotum like in *A. holynskiorum*.

Elytra ovate, strongly convex, $1.16\times$ longer than wide, widest at midlength. Interstriae feebly convex, striae very narrow, fine punctures therein separated by about their diameter.



1, 2, 5. *Antinia kadeji* n. sp.: 1 - sternite VIII (female), 2 - spermatheca, 5 - abdominal sternites.
 3, 4, 6-9. *Antinia szelangowiczi* n. sp.: 3 - sternite VIII (female), 4 - spermatheca, 6 - antenna, 7 -
 fore tarsus, 8 - dorsal view of head, 9 - lateral view of head



10, 11. Pronotum: 10 - *Antinia kadeji* n. sp.; 11 - *A. szelagowiczi* n. sp.; 12. *A. szelagowiczi* n. sp., dorsal view (Photo by M. KADEJ and J. WIATER)

Legs long, slender, protibiae $1.25\times$ longer than pronotum, distal part conspicuously curved inwards, apex like in *A. holynskiorum*. Tarsi narrow, short, claws of unequal length. Abdominal sternites as in Fig. 5.

Genitalia as in Fig. 1, 2.

MATERIAL EXAMINED

Holotype (female): "China, Canton / Ting-wu-Asi / 29.V.09 / Mell. S. V." [yellow label, locality and date handwritten, otherwise black print]; [genitalia in glyceryne]; (preserved in ZMHU).

Antinia szelagowiczi n. sp.

(Figs 3, 4, 6-10, 12)

ETYMOLOGY

This species is dedicated to the eminent cardiologist, doctor of medicine Bogdan SZELAĞOWICZ (Poland)

DIAGNOSIS

Most similar to *Antinia vitiosa* FAUST, *A. variegata* VOSS and *A. szypulai* KANIA, distinguished by their squat body, invisible scutellum, narrow elytral striae, and erect scales on intervals $7\times$ longer than recumbent ones. *A. szelagowiczi* differs from these species in almost uniformly yellowish-brown colouration of scales, lack of any trace of transverse bands on elytra, shape of antennae (7. joint in *A. szelagowiczi* nearly as wide as antennal club, in the remaining three species it is distinctly narrower), and structure of genitalia.

DESCRIPTION

Length of body: 4.65 mm; width of body: 2.65 mm.

Body pyriform (Fig. 12), elytra strongly convex. Unicolorously brown, densely covered with yellowish-brown recumbent and erect scales.

Recumbent scales on the dorsal side very small, lustrous, imbricate, make something like crust tightly wrapping the body. Erect scales on head of variable length, somewhat widened at middle, slightly pointed, ca. $0.4\text{--}0.5\times$ shorter than those at elytral midlength, most conspicuous along median margins of eyes and sides of rostrum. On prothorax erect scales a little shorter than on head, slightly widened, pointed, somewhat inclined backwards behind the anterior margin, forwards before the posterior, distinctly smaller at sides. Elytral erect scales slightly bent backwards, conspicuously widened behind base, then nearly parallelsided and finely pointed at tip or markedly widened and strongly pointed. Erect scales cover 1.-5. interstriae, being longest on 1., very small and inconspicuous on others. On legs erect scales of similar length to those on head but denser, longest on outer surface of tibiae. Antennae with very small erect scales only at tip of club, otherwise with curved semierect setae.

Head behind eyes widened backwards. Pattern of sulci and costae on rostrum and head concealed under scale-crust. Eyes small, distinctly protruding, eccentrically – more strongly behind middle – convex. Rostrum at base ca. $1.17\times$ wider than long, mostly parallelsided, only apically somewhat widened, together with head uniformly slightly convex. Antennal sulci not visible from above (Figs 8, 9). Antennae short. Scape clavate, bent, markedly (as in *A. variegata*) thickened at tip. Ovate club but indistinctly ($1.10\times$) wider than 7. joint of funicle (Fig. 6).

Pronotum slightly convex, $1.41\times$ wider than long, somewhat wider at posterior than at anterior margin, widest behind midlength, more distinctly narrowed towards apex than towards base. Apical margin straight, posterior medially protruding backwards. Tubercles on pronotum slightly convex, even on its outline inconspicuous, bearing usually single scale but sometimes without any. Poorly defined broad median sulcus extends over the whole length of pronotum.

Elytra ovate, $1.13\times$ longer than wide, strongly convex, sides markedly rounded. Interstriae slightly convex, striae very narrow and inconspicuous, totally – like all dorsal surface – covered with recumbent scales. Punctuation in striae invisible. Elytral base distinctly emarginated.

Legs slender, tibiae straight, apices prolonged inwards into small spine covered with white setae. Spine on metatibiae somewhat larger, surrounded with longer white setae. Truncated parts of corbels covered with tiny recumbent scales. Tarsi as in Fig. 7. Claws asymmetric.

Genitalia as in Figs 3, 4.

MATERIAL EXAMINED

Holotype (female): “China / Junh Fa Tam / 21.III.09 / Mell. S. V.” [yellow label, locality and date handwritten, otherwise black print]; [genitalia in glyceryne]; (preserved in ZMHU).

CATALOGUE

Locus typicus of particular species (according to the original publication) has been given in bold in the paragraph on geographical distribution.

Antinia PASCOE, 1871

Antinia PASCOE, 1871: 161 (type species: *Antinia eupleura* PASCOE, 1871 by monotypy); MARSHALL 1919: 273, 274; 1932: 209-210; EMDEN 1936: 217; 1944: 565; EMDEN and EMDEN 1939: 231, 232; VOSS 1958: 1, 30, 31; KANIA and DĄBROWSKA 1995: 494, 495 (transferred from Cneorrhini to Dermatodini, revision, key to the genus *Antinia*); KANIA and STOJCZEW 2001: 89; Kania 2003: 417 (key to the genus *Antinia*); KOJIMA and IDRIS 2003: 77 (key to the Malaysian species).

Dermatodina FAUST, 1895: 81, 82 (type species: *Dermatodina vitiosa* FAUST, 1895 by monotypy); EMDEN and EMDEN 1939: 231 MARSHALL 1926: 371.

“eupleura -group”***eupleura* PASCOE, 1871**

Antinia eupleura PASCOE, 1871: 161, 162 (Pl. 6, Fig. 3) (Lectotype in British Museum Natural History, London, UK, designated by KANIA and DĄBROWSKA 1995: 500); MARSHALL 1932: 210; VOSS 1958: 31; KANIA and DĄBROWSKA 1995: 496-500 (Figs 1-10, 55); KANIA and STOJCZEW 2001: 89; KANIA 2003: 417 (in key to the genus *Antinia*); KOJIMA and IDRIS 2003: 77 (in key to the Malaysian species).

Distribution: [Malaysia] **Penang**, Thailand - Khao Chong (KOJIMA and IDRIS 2003: 77).

Biology: unknown.

***pendleburyi* MARSHALL, 1932**

Antinia pendleburyi MARSHALL, 1932: 209 (Fig. 1) (Lectotype in British Museum Natural History, London, UK, designated by KANIA and DĄBROWSKA 1995: 505); VOSS 1958: 31; KANIA and DĄBROWSKA 1995: 500-506 (Figs 11-23, 55); KANIA and STOJCZEW 2001: 89; KANIA 2003: 418 (in key to the genus *Antinia*); KOJIMA and IDRIS 2003: 77 (in key to the Malaysian species).
Antinia Pendleburyi MSHL.: EMDEN and EMDEN, 1939: 232.

Distribution: [Malaysia] **Malay Peninsula: Langkawi Is., West Coast.**

Biology: unknown.

Remarks: contrary to the erroneous information in KANIA and DĄBROWSKA 1995: 496, not cited in the catalogue of EMDEN and EMDEN, 1939.

***viridis* KOJIMA and IDRIS, 2003**

Antinia viridis KOJIMA and IDRIS, 2003: 73 (Holotype in Centre for Insect Systematic, Universiti Kebangsaan Malaysia: KOJIMA and IDRIS 2003: 76).

Distribution: **Malaysia, Cameron Highlands.**

Biology: unknown. Mountainous moss forest, 1500-1700 m a.s.l. (KOJIMA and IDRIS 2003: 73).

“vitiosa- group”***holynskiorum* KANIA and STOJCZEW, 2001**

Antinia holynskiorum KANIA and STOJCZEW, 2001: 89 (Figs 1-19) (Holotype in Muzeum i Instytut Zoologii Polskiej Akademii Nauk, Warszawa, Poland); KANIA 2003: 415, 417, 418 (in key to the genus *Antinia*).

Antinia holynckiorum [sic!]: KOJIMA and IDRIS 2003: 79.

Distribution: **Vietnam, Tam Dao.**

Biology: unknown. This species “was swept from herbaceous plants, at a path on an edge of subtropical mountain forest, at 1000 m a.s.l. (Fig. 18)” (KANIA and STOJCZEW 2001). The biotope photograph in the quoted publication designates as no. 19, not 18!.

***kadeji* n. sp.**Distribution: **China, Canton, Ting-wu-Asi.**

Biology: unknown.

***szelagowiczi* n. sp.**Distribution: **China, Junh Fa Tam.**

Biology: unknown.

***szypulai* KANIA, 2003**

Antinia szypulai KANIA, 2003: 413 (Figs 1-8), 418: in key to the genus *Antinia*, (Holotype in coll. Department of Biodiversity and Evolution and Taxonomy, Zoological Institute, University of Wrocław, Poland).

Distribution: **Burma, SW Shan State, Taunggyi.**

Biology: unknown.

***variegata* Voss, 1958**

Antinia variegata VOSS, 1958: 30, 31 (Lectotype in Zoologisches Institut und Zoologisches Museum, Universität Hamburg, Germany) designated by KANIA and DĄBROWSKA 1995: 418; KANIA and DĄBROWSKA 1995: 514-518 (Figs 44-55); KANIA and STOJCZEW 2001: 89; KANIA 2003: 418 (in key to the genus *Antinia*).

Distribution: [China] **Shaowu, Kwangtseh.**

Biology: unknown.

***vitiosa* (FAUST, 1895)**

Dermatodina vitiosa FAUST, 1895: 82 (Syntypes in Staatliche Museum für Tierkunde Dresden, Germany); MARSHALL 1926: 371; KANIA and DĄBROWSKA 1995: 506-512 (Figs. 24-42, 55); KANIA and STOJCZEW 2001: 89; KANIA 2003: 418 (in key to the genus *Antinia*).

Antinia theivora MARSHALL, 1919: 274 (Pl. 17, Fig. 3) (type in ? British Museum Natural History, London, UK).

Antinia vitiosa: MARSHALL 1926: 371; 1932: 210; EMDEN and EMDEN 1939: 231, 232; Voss 1958: 31.

Distribution: *vitiosa*: [Indonesia] **Java**, Java: Tjisarua ad Bogor, Tjibulan ad Bogor; *theivora*: **W. Java**.

Biology: The beetles were found feeding on tea-plants (MARSHALL 1919: 274); tea plantation (KANIA and DĄBROWSKA 1995: 512).

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