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A NEW SPECIES OF THE GENUS *EYSARCORIS* HAHN (HETEROPTERA: PENTATOMIDAE) FROM THE MALAYAN SUBREGION

SYED AZHAR HASAN

Zoological Sciences Division, Pakistan Museum of Natural History, Islamabad, Pakistan

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Eysarcoris sumatrana is described as a new species of the genus *Eysarcoris* Hahn from the Malayan subregion. The genus *Eysarcoris* is redescribed with special reference to some of its unknown characters like metathoracic scent apparatus and genitalia. A key to the species recorded from this subregion is also given.

Key words: *Eysarcoris sumatrana,* Metathoracic, Scent apparatus.

Introduction

The Pentatomidae is a cosmopolitan family and many species cause substantial damage to cultivated crops. The family has been very little investigated in the Malayan subregion and the literature on the subject is scantly and scattered [1-7]. While revising the tribe Eysarcorini, the author encountered some specimens differing significantly from the known species of the genus *Eysarcoris*. These specimens named as *Eysarcoris sumatrana*, were studied in detail especially with reference to the metathoracic scent apparatus and the male and female genitalia, and comparison made with type material of all known species of *Eysarcoris* lodged in various museums. Genitalia were dissected out using the techniques of Hasan [8] and Ahmad [9]. Drawings were prepared with the help of a Wild-Type drawing tube attachment.

Eysarcoris Hahn. *Eysarcoris* [10-17], *Eusarcocoris* [18], *Eusarcoris* [19], *Stollia* [20,21], *Neostollia* [22], *Analocus* [23]. Body ovate or obovate. Head usually broader than long, lateral margins sinute, apex rounded, clypeus usually equal to paraclypei, antennae with basal segment short, not reaching apex of head, labium usually reaching metacoxae. Pronotum 2.5x broader than long, lateral angles either abtuse or acute, conspicuously produced into long spines. Posterolateral angles present or absent, scutellum large, often reaching near apex of abdomen, usually longer than wide, apically usually broadly rounded., Thoracic sterna not sulcate. Metathoracic external scent apparatus poorly developed with each peritremal disc short and folded laterally to form very deep peritremal groove, ostiole small, open anterolaterally to the metacoxae, the evaporative area on each side distinct but with small microflaskes, interconnected by 4-5 cuticular ridges.

Female genitalia. Ist gonocoxae large, triangular, usually meeting medially, triangulin and arcus rarely exposed, 8th paratergites always triangular with acute or subacute angles, shorter than Ist gonocoxae, 9th paratergites usually lobe-like, with rounded apices, never extending beyond 8th paratergites. Spermathecal bulb small, round without processes, pump region short, median dilation distinctly two-chambered, distal chamber usually larger than proximal chamber, proximal chamber conspicuously sclerotized distally.

Male genitalia. Pygophore usually as long as broad. Parameres each with a short stem and two lobes, inner lobe sclerotized, narrow, elongate, apices acute or subacute, outer lobe semisclerotized, usually disc-like with numerous marginal setae. Aedeagus with two pairs of conjunctival appendages, dorsal membranous, ventral semisclerotized, penial appendages usually absent or reduced, vesica short, slender.

Distribution. Cosmopolitan, occurring in all zoogeographical regions of the world. Type species. *Eysarcoris aeneus* (Scopoli).

Key to Species:

1. Humeral angles produced 2
   – Humeral angles not produced 12
2. Humeral angles acute 3
   – Humeral angles obtuse 6
3. Pronotum more than 3x broader than long 4
   – Pronotum 2-2.5x broader than long 5
4. Peritremal discs large, orientated posteroventrally; humeral spines curved, elevated ..... insurgens
   – Peritremal disc small, orientated posterolaterally; humeral spines straight, horizontal ..... aenescens
5. Scutellum large covering most of abdomen, apical lobe of scutelum broad ..... sumatrana
   – Scutellum short covering 2/3of abdomen. apical lobe of scutellum narrow ..... obscurus
6. Scutellum as long as broad with very small spot on the anterior angles ..... humeralis
   – Scutellum broader than long with large spot on the anterior angles 7
7. Clypeus shorter than paraclypei ..... dorsalis
   – Clypeus equal to paraclypei 8
8. Body ovate; connexiva exposed ..... desicus
   – Body obovate; connexiva not exposed 9
9. Apical lobe of scutellum pale ochraceous,

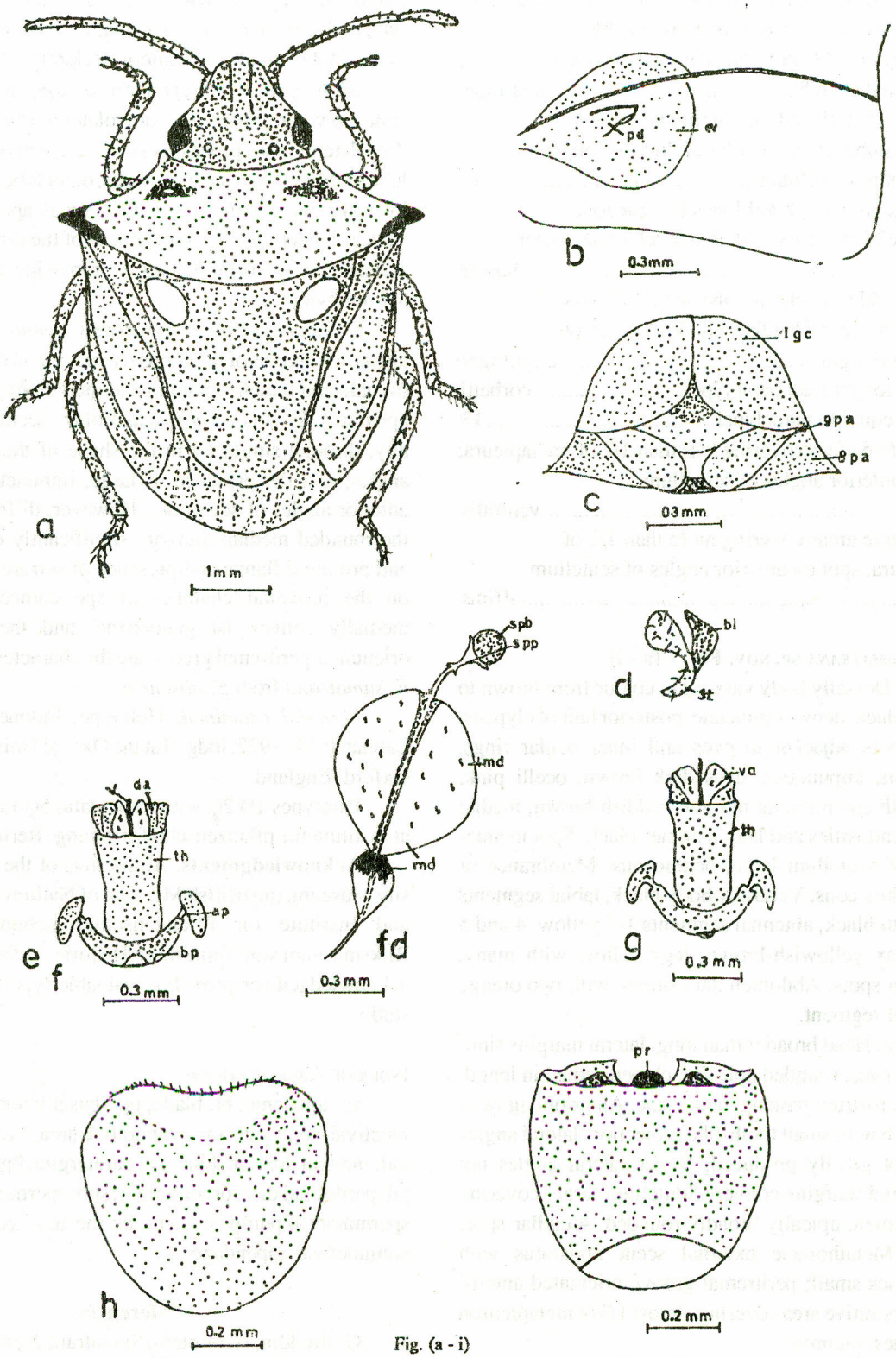

Fig. (a - i)

(a) Dorsal view of male *E. sumatrana* sp. nov.; (b) Left metathoracic external scent apparatus; (c) Female terminalia; (d) Male paramere; (f) Dorsal view of aedeagus; (g) Ventral view of aedeagus; (h) Ventral view of pygophore; (i) Dorsal view of pygophore.

impunctate ..... geminatus
– Apical lobe of scutellum brown, punctate 10
10. Ist gonocoxe separated, triangulin visible distal chamber of spermathecal dilation equal to proximal chamber ..... subarmata
– Ist gonocoxae closed; triangulin not visible distal chamber of spermathecal dilation longer than proximal chamber 11
11 Dorsolateral pygophoral lobes conspicuous paramere blades curved with a notch on the outer margin ..... robustus
– Dorsolateral pygophoral lobes inconspicuous; paramer blades triangular without a notch on the inner margin ..... guttiger
12. Clypeus longer than paraclypei ..... corbetti
– Clypeus equal to paraclypei 13
13. Evaporative areas covering less than 1/2 of metapleura; spot on anterior angles of scutellum present ..... ventralis
– Evaporative areas covering more than 1/2 of metapleura, spot on anterior angles of scutellum absent ..... affinis

EYSARCORIS SUMATRANA SP. NOV. **Fig. 1 (a - i)**

Colour. Dorsally body varying in colour from brown to black. Head black, densely punctate, posterior half of clypeus, two small spots adjacent to eyes and inner ocular rings, reddish-brown, impunctate, eyes dark brown, ocelli pink, pronotum with anterolateral margins reddish-brown, medial part yellow, callosities and lateral angles black. Spot in anterior angles of scutellum large, ochraceous. Membrance of hemelytra ochraceous. Ventrally body black, labial segments 1-3 brown, 4th black, antennal segments 1-3 yellow, 4 and 5 brown. Thorax yellowish-brown, legs yellow with many, minute brown spots. Abdomen dark brown with two orange streaks on 3rd segment.

Structure. Head broader than long, lateral margins sinuate infront of eyes, rounded apically, clypeus equal in length to paraclypei, rostrum passing metacoxae. Anterior angles of pronotum each with small tooth-like projection, lateral angles acute, but not greatly produced, posterolateral angles not developed, hind margins convex. Scutellum large, covering most of abdomen, apically broadly rounded, scutellar spots impunctate. Metathoracic external scent apparatus with peritremal discs small; peritremal groove orientated anterolaterally, evaporative area covering almost 1/3 of metapleuron and part of mesopleuron.

Female genitalia. Ist gonocoxae convex posteromedially, 8th paratergites slightly sinuate posteriorly, istinctly shorter than Ist gonocoxae, 9th paratergites apicaly, equal in length to 8th paratergites, rounded apically. Spermathecal pump short, slender with distal flange larger than proximal flange, distal chember of spermathecal dilation large, proximal chamber small with anterior sclerotized area serrate.

Male genitalia. Pygophore as long as broad, slightly concave ventroposteriorly, dorsolateral lobes not prominent, dorsolateral inner processes small. Each paramere with inner lobe highly sclerotized, triangular, outer lobe semisclerotized, lobe-like with numerous setae. Penial appendages absent, vesica slender, just reaching apices of the dorsal conjunctival appendages. ♀ = 6.1 mm long, 4.7 mm wide. ♂ = 5.9 mm long, 4.7 mm wide

Comparative note: *Eysarcoris sumatrana* differs from all known species of the genus *Eysarcoris* in size, colour, form of male and female genitalia and metathoracic external scent apparatus. *Eysarcoris obscurus* Vollen, seems to be its closest ally, through similarity in the shape of the lateral pronotal angles, and the presence of large, impunctate spots in the anterior angles of scutellum. However, difference in colour, the rounded median dilation, significantly developed distal and proximal flange and presence of serrare sclerotized area on the proximal chamber of spermatheca, the posteromedially convex Ist gonocoxae, and the anterolaterally orientated peritremal groove are the characters differentiating *E. sumatrana* from *E. obscurus*.

Material examined. Holotype, Indonesia, Sumatrana, Labuan Bilik, 1922, lodged at the Oxford University Museum, Oxford, England.

Paratypes 1♂2♀ with same data, 5♀ Java, 1935 lodged at institute fur pflanzenschtzforschung, Berlin, Germany.

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INDEX OF ABBREVIATIONS

ap: apodeme, bl: blade, bp: basal plate, da: dorsal conjunctival appadege, ev: evaporative area, 1gc: Ist gonocoxae, md: median dilation, 8pa: 8th paratergite, 9pa: 9th partergite, pd: peritremal disc, pr: proctiger, spb: spermathecal bulb, spp: spermathecal pump, st: stem, th: theca, v: vesica, va: ventral conjunctival appendage.

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