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ZOOLOGICAL SERIES

OF

FIELD MUSEUM OF NATURAL HISTORY

Volume XX

CHICAGO, AUGUST 30, 1938

No. 32

HEMIPTERA FROM IRAQ, IRAN, AND ARABIA

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During the Field Museum Anthropological Expedition to the Near East in 1934, the leader, Dr. Henry Field, and his collaborators obtained a large amount of zoological material. Later, more specimens were acquired by Dr. Field's collector, Yusuf Lazar, in Iraq. From Mr. H. St. J. Philby, in Mecca, Arabia, Field Museum also received, as a much appreciated gift, various zoological specimens from Arabia.

Among the insects obtained as indicated were some interesting Hemiptera, which I am recording at the request of the Director of Field Museum and by permission of the Trustees of the British Museum (Natural History). A cicada, *Melampsalta fraseri*, from Iraq, and a genus and species of fulgorid, *Philbyella arabica*, from Arabia, proved to be new and are, therefore, described. Wherever possible, the spelling of the locality names conforms to that adopted by the Permanent Committee on Geographical Names of the Royal Geographical Society, London.

HETEROPTERA

CYDNIDAE

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Macroscytus brunneus (Fabricius).

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Iraq: Baghdad, one specimen, June 8, 1936; Yusuf Lazar.

Arabia: Mecca District, five specimens, December 22, 1932; January 3, 5, 20, 1933; April 1, 1933; H. St. J. Philby.

Widely distributed over the Mediterranean, Ethiopian, and Oriental regions.

Cydnus hispidulus Klug.

Arabia: Mecca District, one specimen, February 9, 1933; H. St. J. Philby.

Recorded from Arabia, Egypt, Syria, and Somaliland.

¹Department of Entomology, British Museum (Natural History).

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PENTATOMIDAE

Chroantha ornatula (H.-Schaeffer).

Arabia: Mecca District, eight specimens, November 2, 5, 1931; November 7, 10, 1933; December 21, 1933; H. St. J. Philby.

Recorded from Spain, Dalmatia, Sicily, Greece, Algeria, Tunisia, Egypt, Syria, Iran, Arabia, Socotra, and the Turkoman S.S.R.

Eurygaster integriceps Puton.

Iraq: Baghdad, two specimens, January 8, 10, 1935; one specimen, March 6, 1935; one specimen, April 12, 1935; five specimens, May 22, 24, 25, 1935; one specimen, June 6, 1935; one specimen, October 26, 1935; seven specimens, May 15, 1936; Yusuf Lazar.

Recorded from Italy, Greece, Syria, southern Russia, the Caucasus, Iran, Iraq, and Turkestan.

Apodiphus amygdali (Germar).

Iraq: Hinaidi, near Baghdad, fifteen specimens, June-November, 1935; Yusuf Lazar.

Iran: Shah 'Abdul 'Azim (Rayy), one specimen, August 14, 1934; H. Field.

Recorded from Italy, southern Austria, Turkey, Greece, Asia Minor, Syria, Iran, and the Turkoman S.S.R.

Nezara viridula (Linnaeus).

Iraq: Baghdad, two specimens, January 15, 1935; two specimens, June 11, 1936; Yusuf Lazar.

Nezara viridula var. torquata (Fabricius).

Iraq: Baghdad, one specimen, August 14, 1936; Yusuf Lazar. Cosmopolitan except in colder regions.

Acrosternum millierei (Mulsant and Rey).

Arabia: Mecca District, one specimen, November 2, 1931; H. St. J. Philby.

Recorded from southern France, Canary Islands, Italy, southern Hungary, Syria, the Turkoman S.S.R., and Turkestan.

Acrosternum breviceps (Jakowleff).

Iraq: Hinaidi, near Baghdad, two specimens, August 24, 1935; September 3, 1935; Yusuf Lazar. Baghdad, one specimen, May 15, 1936; Yusuf Lazar.

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Arabia: Mecca District, one specimen, November 15, 1931; H. St. J. Philby.

Recorded from the Caucasus, Iraq, Bokhara in the Uzbek S.S.R. Dolycoris baccarum (Linnaeus).

Iran: Yezd-i-Khast, one specimen, August 21, 1934; H. Field.

Widely distributed over the Palaearctic, Oriental, and Nearctic regions.

Eurydema festivum f. decoratum (H.-Schaeffer).

Iraq: Baghdad, one specimen, April 16, 1935; Yusuf Lazar.

Eurydema festivum f. pictum (H.-Schaeffer).

Iraq: Hinaidi, near Baghdad, one specimen, June 8, 1935; Yusuf Lazar.

Widely distributed over central Europe, the Mediterranean region, Syria, Asia Minor, Iran, the Caucasus, Turkestan, and extending into Kashmir and China.

Peribalus vernalis (Wolff).

Iraq: Baghdad, one specimen, May 15, 1936; Yusuf Lazar.

Widely distributed over central Europe and the Mediterranean region, and extending eastward to Iran and Turkestan.

Eysarcoris inconspicuus (H.-Schaeffer).

Iraq: Baghdad, one specimen, May 15, 1936; Yusuf Lazar.

Distributed over southern Europe, the Mediterranean, Oriental, and Ethiopian regions.

COREIDAE

Omanocoris variabilis (Dallas).

Iraq: Baghdad, five specimens, April 12, 16, 1935; June 27, 1935; Yusuf Lazar. An Nasiriya, six specimens, March 16, 19, 1935; Yusuf Lazar.

Recorded from Iraq, Iran, Seistan, Baluchistan, and the Punjab. Ceraleptus obtusus Brullé.

Iraq: Baghdad, two specimens, May 15, 1936; Yusuf Lazar.

Widely distributed in the Mediterranean region and extending into the Caucasus and the Turkoman S.S.R.

Stenocephalus pallidus Signoret.

Arabia: Mecca District, one specimen, December 22, 1932; H. St. J. Philby.

Iran: Yezd-i-Khast, one specimen, August 25, 1934; H. Field. Recorded from Egypt, the Sudan, and Arabia.

Stenocephalus caffer Dallas.

Arabia: Mecca District, one specimen, November 7, 1933; H. St. J. Philby.

Recorded from South Africa.

Stenocephalus mairei Bergevin.

Arabia: Mecca District, one specimen, February 22, 1933; H. St. J. Philby.

Recorded from the Sahara (Hoggar Mountains).

Therapha hyoscyami (Linnaeus).

Iran: Isfahan, two specimens, August 18, 1934; H. Field and R. A. Martin.

Widely distributed over the Palaearctic region, including Sind, British India.

LYGAEIDAE

Spilostethus pandurus (Scopoli).

Iraq: Baghdad, two specimens, November 20, 1934; June 8, 1936; Yusuf Lazar.

Iran: Yezd-i-Khast, one specimen, August 21, 1934; H. Field. Widely distributed over the warmer parts of the Old World.

Dieuches schmitzi Reuter.

Iraq: Baghdad, one specimen, November 10, 1934; Yusuf Lazar. Hinaidi, near Baghdad, five specimens, July 17, 23, 1935; Yusuf Lazar.

Previously only recorded from Madeira, but now known to occur in the Canary Islands, Arabia, and Iraq.

Aphanus apicalis (Dallas).

Arabia: Mecca District, one specimen, February 17, 1933; H. St. J. Philby.

Extending from South Africa through East Africa to the Sudan, Somaliland, and Arabia.

REDUVIIDAE

Oncocephalus plumicornis (Germar).

Arabia: Mecca District, two specimens, October 29, 1931; April 28, 1933; H. St. J. Philby.

Recorded from southern Russia, the Caucasus, Turkestan, and Iran.

Oncocephalus obsoletus Klug.

Iraq: Hinaidi, near Baghdad, one specimen, July 30, 1935; Yusuf Lazar.

Known from Algeria, the Anglo-Egyptian Sudan, and Iraq.

Oncocephalus sp.

Iraq: Baghdad, one larva, March 22, 1936; Yusuf Lazar.

Stirogaster desertorum Horváth.

Arabia: Mecca District, one specimen, March 3, 1933; H. St. J. Philby.

Recorded from the Sahara.

Reduvius tabidus (Klug).

Iraq: Hinaidi, near Baghdad, two specimens, July 17, 1935; August 8, 1935; Yusuf Lazar.

Arabia: Mecca District, one specimen, April 12, 1933; H. St. J. Philby.

Recorded from Algeria, Tunisia, and the Turkoman S.S.R.

Reduvius annulipes Reuter.

Iraq: Hinaidi, near Baghdad, three specimens, July 23, 30, 1935; August 8, 1935; Yusuf Lazar.

Known from Morocco and Iraq.

Ectomocoris ululans (Rossi).

Iraq: Hinaidi, near Baghdad, eight specimens, July and September, 1935; Yusuf Lazar.

Widely distributed over the Mediterranean region and extending into Turkestan.

Ectomocoris cordiger Stål.

Iraq: Hinaidi, near Baghdad, one specimen, July 22, 1935; Yusuf Lazar.

Recorded from India and Iran.

Ectomocoris fenestratus (Klug).

Arabia: Mecca District, one specimen, November 2, 1931; H. St. J. Philby.

Recorded from the Canary Islands, Uganda, the Sudan, and Arabia.

Ectomocoris quadrimaculatus (Serville).

Iraq: Hinaidi, near Baghdad, one specimen, August 9, 1933; Yusuf Lazar.

GERRIDAE

Gerris lateralis Schummel.

Iran: Yezd-i-Khast, three specimens, August 21, 1934; H. Field and R. A. Martin.

Recorded from Germany, Austria, and the Caucasus.

BELOSTOMATIDAE

Lethocerus niloticus Stål.

Iraq: Baghdad, five specimens, June 28, 1934; May 24, 1935; July 3, 1935; December 6, 1935; August 15, 1936; Yusuf Lazar.

Recorded from the eastern Mediterranean, Arabia, Iraq, Iran, Egypt, the Sudan, and eastern Africa.

HOMOPTERA CICADIDAE

Cicadatra ochreata Melichar.

Iraq: Hinaidi, near Baghdad, four specimens, July 19, 25, 1935; Yusuf Lazar.

Recorded from Turkestan, Afghanistan, and Iran.

Melampsalta musiva (Germar).

Iraq: Hinaidi, near Baghdad, one specimen, July 17, 1935; Yusuf Lazar.

Recorded from northern Africa, Egypt, Arabia, Asia Minor, the Caucasus, Iraq, and Iran.

Melampsalta fraseri sp. nov. Figure 57.

Type from Hinaidi Cantonment, Baghdad, Iraq. Male. In British Museum (Natural History). Collected in 1921 by A. D. Fraser.

Paratypes from Baghdad, Iraq; one in British Museum, two, male and female, in Field Museum. Collected July 31, 1935, and August 14, 1936, by Yusuf Lazar.

Color.—Opaque bright yellow, with the following black or dark brown markings (fig. 57, a): Vertex, except a median longitudinal sordid yellow stripe at base behind front ocellus, a round yellow spot on lateral margin in front of each eye and an obscure ferruginous arcuate band between lateral ocellus and inner angle of each eye; a pair of short anteriorly convergent stripes on base of frons, giving rise to a pair of longitudinal dappled stripes down middle of frons; the cheeks below antennal scrobes and lower margins of eyes; sides of clypeus; apical segment of rostrum; a large round spot on each side of pronotum covering the oblique impressions; a small round spot in middle of base of pronotum; three longitudinal stripes on mesonotum, the two lateral ones narrowing towards apex, the median one relatively narrower and widening towards the apex but with a constriction in the middle; a pair of small spots at apex of

mesonotum, one above end of each anterior lateral arm of cruciform elevation, the middle of which also bears a brown longitudinal stripe; a stripe down middle of back of abdomen formed by a spot in the middle of each tergite, the spots gradually decreasing in size from second to eighth tergite; a short stripe on lower surface of each femur; and spines of anterior femora and hind tibiae. Tegmina hyaline; veins yellow, darkening towards apex of tegmen, with costal margin narrowly black; the subcostal vein, apex of R1, tip of anal

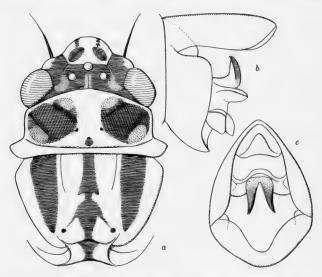


Fig. 57. Parts of *Melampsalta fraseri*. a. Head, dorsal view, pronotum, and mesonotum. b-c. Side and end views of genitalia.

vein and claval suture, lower half of cross vein at base of eighth apical cell and cubital vein along upper edge of eighth apical cell, all infuscate.

Structure.—Head about two and a half times wider than long in middle (110:45), slightly wider than anterior lobe of pronotum; the frons very prominent, seen from above as long as vertex in middle; rostrum extending to intermediate trochanters. Pronotum with the anterior lobe more or less parallel-sided, slightly longer than head (45:43); posterior lobe very short (narrow), but much wider

than anterior lobe (125:107). Mesonotum slightly longer in middle than head and pronotum together (95:93). Abdomen about as long as head, pronotum, and mesonotum together (190:188). Tympanal coverings absent; opercula short, only slightly longer than openings, extending somewhat towards middle line of venter and reaching the line of posterior trochanters. Basal sternite between the opercula elevated in a rounded tubercle. Genitalia as figured (fig. 57, b and c).

Measurements.—Length of body 16 mm.; width of pronotum at base 5.5 mm.; expansion of tegmina 37 mm.

Remarks.—This insect differs from all of the Melampsalta species known to me in the prominent frons. It resembles the northwest Indian (Quetta) M. continuata (Distant, 1888) in general appearance, but it has a distinctly shorter abdomen, shorter wings, and a yellow instead of a rufous ground color. The pronotal brown markings are also smaller and the subgenital valve is much shorter than in M. continuata. Ollenbach (Ind. Forest Records, 13, pt. 6, pp. 8–9, 1928) has described a Melampsalta minuta from the United Provinces of India, which he states resembles M. continuata (Distant), but differs in smaller size. So far as can be judged from his description and figure, the present species is distinct from it.

This species is dedicated to Major A. D. Fraser, D.S.O., M.C., R.A.M.C., who collected the type specimen in 1921.

DICTYOPHARIDAE

Chanithus striatus (Oshanin).

Iraq: Hinaidi, near Baghdad, two specimens, August 19, 1935; September 3, 1935; Yusuf Lazar. Baghdad, three specimens, May 25, 1935; May 15, 1936; Yusuf Lazar.

Recorded from the Caucasus.

FLATIDAE

Phantia cylindricornis Melichar.

Arabia: Mecca District, one specimen, January 24, 1933; H. St. J. Philby.

Recorded from Iran.

RICANIIDAE (NOGODININAE)

Philbyella gen. nov.

Tegmen opaque hyaline, about two and one half times as long as wide at apex of clavus, almost parallel-sided but slightly widened towards apex; costal margin at base moderately rounded, the apical margin broadly rounded; radius 1 and 2¹ arising from the basal cell by a very short common stalk and running more or less parallel to the stigma (fig. 58, a); radius 2 forking basad of stigma; the median

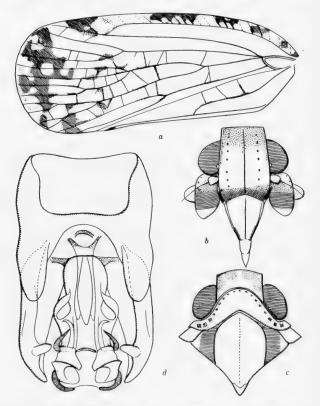


Fig. 58. Parts of *Philbyella arabica*. a. Tegmen. b. Front view of head. c. Head, top view, pronotum, and mesonotum. d. Genitalia.

arising from basal cell, contiguous with the radius and forking near middle of tegmen; cubitus forking a little beyond median fork; claval nerves united level with middle of claval commissure; corium

¹ Melichar's nomenclature is used here.

with numerous cross veins: clavus with few cross veins, these being most numerous towards the apex of tegmen but not forming a distinct subapical line; costal membrane distinctly narrower than costal cell. Vertex (fig. 58, c) strongly concave, about twice as wide as long in middle, about two-thirds length of pronotum in middle; anterior margin almost straight but slightly arcuate; anterior and lateral margins carinate; from (fig. 58, b) without impressions, about twice as long as wide anteriorly, slightly widening towards apex where margins are convexly sinuate; median carina distinct, percurrent; lateral carinae absent or only very faintly indicated; lateral margins sharply carinate; clypeus triangular, moderately inflated, with distinct middle keel and rather less distinct side keels; rostrum reaching the hind margin of hind coxae, the terminal segment shorter and thinner than the preceding one. Pronotum concave, nearly three times as long in middle as at the sides and one and a half times longer than vertex, extending anteriorly beyond middle of eyes; posteriorly rather angularly emarginate; a number of obscure longitudinal ridges at sides, forming rectangular depressions. Mesonotum (scutellum) moderately inflated, with median keel more or less obsolete; area between lateral keels flattened; lateral keels converging along anterior margin and uniting in front of median keel. Hind tibiae with three spurs, one at apex, one in middle and a minute one (sometimes absent) towards base.

Genotype.—Philbyella arabica sp. nov.

Philbyella belongs to Melichar's¹ group A: "Elytres coriaces ou subhyaline," and runs down to the Malayan genus Goniopsis Melichar, from which it differs in the much broader costal membrane, more parallel-sided frons with only one distinct (median) carina, and pronotum shorter in the middle compared with vertex. It is also allied to the east African genus Privesomorphus Schmidt, from which it differs by having the costal membrane distinctly narrower than the costal cell; tegmina more or less parallel-sided, gradually widening to apex; no oblique impressions at upper angles of frons; and hind tibiae with only three spines.

The genus is respectfully dedicated to Mr. H. St. J. Philby, whose excellent collections have contributed largely to our knowledge of the Arabian fauna.

 $^{^{\}rm I}$ Genera Insect., Acanaloniidae, Flatidae, and Ricaniidae, fasc. 182, p. 149, 1923.

Philbyella arabica sp. nov.

Type from Mecca District, Arabia. Male. In British Museum (Natural History). Collected November 3, 1933, by H. St. J. Philby.

Paratypes from Mecca District, Arabia; one male, April 27, 1933, and two females, November 3, 1933, in British Museum; one male, October 29, 1931, and one female, November 6, 1933, in Field Museum; all collected by H. St. J. Philby.

Color.—Pale pinkish opaque yellow, almost whitish between longitudinal veins of corium. Dark brown markings as follows: Dense mottling at base and apex of frons, forming two more or less distinct transverse bands; apical half of sides of clypeus; an obscure transverse band on gena beneath antennae, and another band on upper half of gena between ocellus and vertex; dense mottling on propleura except posterior margin; two areas on mesopleuron; impressions on sides of pronotum and along anterior margin; sides of mesonotum beyond lateral carinae and some mottling inside the lateral carinae; six or seven irregular blotches spaced evenly along costal membrane; some irregular mottling on corium and clavus much denser and forming an irregular pattern on stigma and membrane. Tips of tibial and tarsal spines black. Hind wings hyaline, with brown veins and the apical third infuscate.

Male with brown markings much reduced, especially on the tegmen. Genitalia as figured (fig. 58, d).

Measurements.—Total length: male, 7 mm.; female, 9 mm.

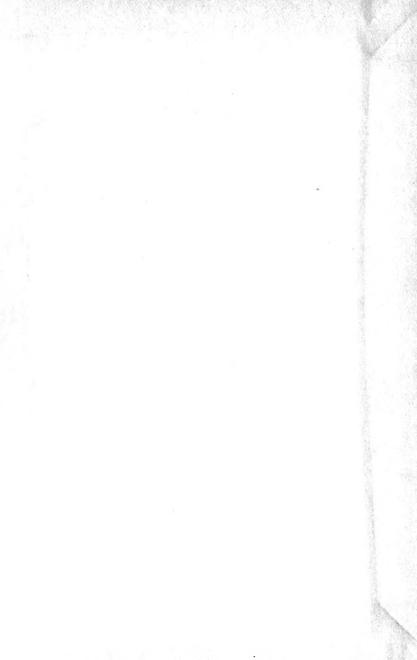
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