

XIV. *Notes on some Hemiptera-Homoptera, with descriptions of new species.* By W. L. DISTANT.

[Read May 1st, 1878.]

THE following descriptions of a few Homopterous insects, belonging to the families *Stridulantiæ* and *Cercopina*, may, perhaps, be best introduced by a few remarks concerning the geographical distribution of the latter. It would, indeed, be difficult to find a better example of the uncertainty of all generic calculations as to geographical distribution than is afforded by the family *Cercopina*.

Fabricius included all the *Cercopina* in the genus *Cercopis*, which would thus exhibit almost a world-wide range. Germar, in 1821, separated this into two great divisions, *Cercopis* and *Aphrophora*, with the first of which we will now only deal. In 1839, Burmeister included in *Cercopis* insects which were common to Java, Asia, Europe, Central America and Brazil. In 1843, Amyot and Serville restricted *Cercopis* to insects which, as then known, were common only to Java, China and the islands included in the Australian region, and instituted the genera *Tomaspis*, *Rhinalaux*, *Triecphora*, *Monecphora* and *Sphenorhina*; the genus *Tomaspis* being restricted to insects from South and Central America. In 1866, Stål had sunk the genera *Triecphora*, *Monecphora* and *Sphenorhina*, and placed them in the genus *Tomaspis*, under which he had also described insects from Africa and the Indian and Malayan region, thus giving the genus a home in the Neotropical, Ethiopian and Oriental regions. In 1870, however, Stål founded his genus *Phymatostetha*, which included all the Eastern species of *Tomaspis* he had described, and so the last-named genus now only includes representatives from the Neotropical and Ethiopian regions. As for the genus *Cercopis*, it is now almost lost in the genera *Cosmoscarta* and *Phymatostetha*. I think any entomologist who considers these facts will acknowledge how empirical it is to draw great conclusions in geographical distribution from generic calculations alone.

STRIDULANTIA.

Genus PLATYPLEURA, Amyot and Serville.

Platypleura andamana, n. sp.

Tawny, pubescent. Face moderately convex, transversely sulcated, with a deep central longitudinal furrow; luteous, with two short black basal lines on each side of vertex. A narrow black fascia, extending from eye to eye, immediately in front of ocelli. Eyes brilliant, castaneous, broadly pilose behind. Pronotum deeply furrowed, with frontal edge and two small foveæ, placed close together near centre of hind border, pitchy. Mesonotum, with two large obconical spots, extending backwards from fore border, midway between which there is a discal dart-shaped mark, and two dots wide apart near hind border, black; there are also two other somewhat obscure black marks situated on fore border on outer sides of the large obconical spots. Metathoracic cross, with its fore borders, pitchy. Abdomen above with segmental sutures black, clothed with luteous pubescence; anal appendage pitchy, castaneous. Underside with legs ochraceous. Rostrum extending to second abdominal segment; its tip, two spots on the sixth abdominal segment, knees and tarsi, piceous.

Tegmina dark brown, with pale semi-opaque markings, especially on the apical half. Basal third thickly covered with pale pubescence, and containing five dark-brown spots, of which the most prominent are two which are subcostal, situated beyond the medium of this space, and a third one below the basal of those two spots. Remainder of tegmina less pubescent, with a number of whitish spots, of which the most prominent are a transverse row stretching across from near costa to inner border, immediately beyond the basal third pubescent space; another more waved row beyond middle confluent near costa, *where they are very visible below*; a subapical marginal row of five whitish oblong spots, arranged on the nervures of which the apical ends are dull brown; and an outer marginal row of six dark-brown spots, also arranged on the nervures of which the lowest is the largest; a dull whitish fusiform spot on inner angle, which is *very distinct on underside*. Wings castaneous, with a dark-brown marginal border, and some suffused dark-brown discal streaks extending across the wings.

♀. Long. 22 mill.; exp. tegm. 84 mill.

Andaman Isles.

This species is allied to the Madagascar form, *P. guttulata*, Sign.; the tegmina are, however, much narrower and much less arched on the costal edge near base, the lateral edges of the thorax differ in being pointedly acute, the rostrum is longer, ground colour much darker and markings different, though the general pattern is much followed.

Genus *TOSENA*, Amyot and Serville.

Tosena albata, n. sp.

General colour and markings of *T. melanoptera*. White; but tegmina with five longitudinal whitish fasciæ situated between the veins commencing near base, two of which amalgamate with the broad central transverse band, and a subapical row of five irregular longitudinal fasciæ of the same colour, the first of which is placed at about one-third the length of outer border from the apical point of tegmina, and the last is fused into the central band near the inner margin. Wings as in *T. melanoptera*, but with a submarginal row of nine whitish fasciæ, commencing near costa, of which the seventh and ninth are the largest, the last very much so; two-thirds of the outer border narrowly edged with the same colour.

♂. Long. 59 mill.; exp. tegm. 132 mill.

N. W. Himalaya.

This species is also smaller than *T. melanoptera*, with the tegmina narrower and rostrum quite reaching the first abdominal segment, which is not the case in the males of that species. The apices of the femora are not luteous.

CERCOPIDA.

Genus *COSMOSCARTA*, Stål.

Cosmoscarta andamana, n. sp.

Sanguineous, thickly and finely punctured; tegmina, with a broad band across centre and apex broadly, black: these bands are united at inner margin, in some specimens very broadly so. Wings sordidly hyaline, with the veins much darker; base slightly sanguineous. Femora, tibiæ and tarsi, piceous, hind tibia armed with an acute spine.

Long. 9 mill.; exp. tegm. 24 mill.

Andaman Isles.

Allied to *C. heros*, Fab., with which, however, it cannot be confused.

Genus TOMASPIS, Amyot and Serville. Stål. Hem.
Af. iv. p. 56.

A. *Posterior tibiæ armed with two spines.*

a. *Spines long, robust.*

Tomaspis modesta, n. sp.

Fuscous, shining; head, pronotum and scutellum somewhat coarsely punctured, tegmina very thickly and finely punctured. Face convexly tumid, somewhat obscurely transversely sulcated with central keel very distinct, pale fuscous. Head rounded in front, ocelli prominent. Head, pronotum, scutellum and underside of body dark fuscous. Lateral edges of thorax above and below with legs, pale fuscous. Abdomen above dull reddish. Wings sordidly hyaline. Posterior tibiæ armed with two strong spines.

Long. ex. tegm. 10 mill.; exp. tegm. 29 mill.

Mongo-ma-lobah, W. Africa.

Tomaspis Monteironis, n. sp.

Black, shining, thickly and finely punctured; abdomen, femora and rather more than basal half of tibiæ, sanguineous. Lateral borders of abdomen beneath, with a segmental row of large quadrate black spots. Face robustly and convexly tumid, distinctly transversely sulcated; central keel faintly indicated. Pronotum with two small obscure intra-ocular depressions near fore border, behind which are two transverse and somewhat deflected striæ. Wings sordidly hyaline, bases of wings above, and wings and tegmina below narrowly sanguineous. Posterior tibiæ armed with two strong spines.

Long. ex. tegm. 9 to 10 mill.; exp. tegm. 23 to 26 mill.

Delagoa Bay (Monteiro).

Tomaspis conspicua, n. sp.

Black, shining, thickly and finely punctured; tegmina with a large central oblong sanguineous spot. Abdomen and legs dull reddish; apices of tibiæ and tarsi piceous. Face robustly and convexly tumid, distinctly transversely sulcated, central keel faintly indicated. Pronotum with two intra-ocular distinct rounded impressions near anterior border, behind which are two transverse somewhat deflexed striæ. Wings sordidly hyaline, bases of wings

above, and of wings and tegmina below, dull reddish. Posterior tibiæ armed with two strong spines.

Long. ex. tegm. 10 mill.; exp. tegm. 26 mill.

Nyassa.

As may be seen from the above description, *T. conspicua* is closely allied to *T. Monteironis*, from which, however, it can be easily distinguished, not only by the prominent spot on the tegmina and the absence of the spots on the lateral abdominal edges below, but also by the following structural characters. The pronotum is broader and more convex, and the frontal borders of the scutellum very much more raised and distinct. The sculpture of the upper surface of the head is also different.

aa. *Upper spine of posterior tibiæ small, obscure.*

Tomaspis binotata, n. sp.

Black, shining, thickly and finely punctured. Scutellum somewhat transversely strigose. Tegmina with a median irregularly-rounded spot situated at about two-thirds the length from base, and a larger, somewhat fusiform claval streak commencing at base, bright fulvous. Head rounded in front. Face convexly tumid, faintly and transversely sulcated, keel distinct. Eyes fulvous. Legs obscure, livid. Wings sordidly hyaline. Posterior tibiæ armed with two spines, the upper one of which is very small and obscure.

Long. ex. tegm. 9 mill.; exp. tegm. 23 mill.

Isubu, W. Africa.

B. *Posterior tibiæ armed with one spine.*

Tomaspis nyassæ, n. sp.

Black, shining, thickly and finely punctured, pronotum with traces of a central longitudinal impression, which appears as an elevated ridge at base. Corium, with a submedian oblique fascia, extending from about costal edge to claval suture, where it is somewhat narrowed, an apical transverse fascia semicircular in shape, rounded externally and profoundly dentated about the centre, almost extending from costa to inner margin, and a large streak, which, commencing at base, occupies about one-half of the claval area, sanguineous. Abdomen, excepting apex, legs, rostrum, excepting base, sanguineous. Wings sordidly

hyaline, with the base narrowly sanguineous. Eyes pale fulvous. Face convexly tumid, transversely and distinctly sulcated, central keel distinct and prominent. Posterior tibiæ armed with one spine near apex.

Long. ex. tegm. ♂ 15 mill.; exp. tegm. ♂ 38 mill.
 „ ♀ 18 mill. „ ♀ 42 mill.

Nyassa (Simon).

The ♀ is much less brightly coloured than the ♂.

Genus SPHENORHINA, Amyot and Serville.

Dr. Stål has included in the genus *Tomaspis* the genera *Triecphora*, *Monecphora* and *Sphenorhina*. I quite agree with him in sinking the two first named, but the last seems so well marked a genus, and one so easily recognized, that I consider it at least convenient to retain it.

Sphenorhina distincta, n. sp.

Black, shining, thickly and finely punctured. Head, thorax and scutellum slightly pilose. Reticulated portion of tegmina somewhat ferruginous, corium black, shining. Abdomen and posterior legs (tarsi excepted, which are black), sanguineous. Wings obscure hyaline, somewhat fuscous at outer borders. Posterior tibiæ armed with a strong spine; scutellum large, transversely striated.

Long. ex. tegm. 6 mill.; exp. tegm. 18 mill.

Irazu (Rogers). 6-7,000 ft. Coll. Godman and Salvin.

This species is somewhat allied to *S. metallica*, Walk.

Sphenorhina plagiata, n. sp.

Testaceous; thorax black, with the anterior and lateral edges and a transverse central band testaceous. Eyes luteous. Pectus and abdomen black, the last with the posterior segmental edges and the anal appendage obscure testaceous. Legs testaceous, with a pitchy streak on femora, commencing at base. Pronotum and tegmina thickly and finely punctured. Wings obscure hyaline. Posterior tibiæ armed with two spines, one near the base small, the second a little past middle long robust.

Long. ex. tegm. 8 mill.; exp. tegm. 18 mill.

Costa Rica. (Van Patten.) Coll. Godman and Salvin.

This species above has somewhat the appearance of *Locris transversa*. Thunb., from S. and E. Africa.

Sphenorhina septemnotata, n. sp.

Fulvous, shining, tegmina with seven small orange spots, three in a transverse line near base, two near middle, and two near apex. There is also a small orange patch at base. Wings pale hyaline; hind tibiæ armed with two spines, first small near base, the second long, robust a little past middle.

Long. ex. tegm. 6 mill.; exp. tegm. 20 mill.

R. Susio, Costa Rica (Rogers). Coll. Godman and Salvin; Distant.

Sphenorhina grandis, n. sp.

Sanguineous. Tegmina with a very broad black border, which, commencing about one-third from base, is carried along costa, continued round apex and along inner edge to about one-third of its length, when it is gradually narrowed and carried upwards along claval suture to near base. This border is widest at apex and inner border. Wings fuscous, hyaline. Fore legs black; hind femora, abdomen above (excepting near lateral borders) and below, antennæ and eyes sanguineous. The tegmina are very thickly and finely punctured, the pronotum somewhat pubescent and obscurely and finely punctured. Posterior tibiæ armed with one strong spine.

Long. ex. tegm. 15 mill.; exp. tegm. 50 mill.

New Granada.

Sphenorhina Bogotana, n. sp.

Head, pronotum and scutellum, sanguineous; tegmina luteous, apical third pitchy, which is continued as a subcostal streak towards base. A sanguineous submedian longitudinal fascia commencing at base and continued to near apex, when it is abruptly deflexed and terminates on inner margin. Wings fuscous, hyaline, shining, narrowly sanguineous at base. Abdomen above and below, legs and coxæ, black; hind femora somewhat paler. Face, eyes and antennæ, sanguineous. Posterior tibiæ armed with one spine.

Long. ex. tegm. 11 mill.; exp. tegm. 33 mill.