Several New Western Jassids.

By E. D. BALL, Logan, Utah.

Platymetopius nigriviridis n. sp.

Form of loricatus nearly, with vertex longer in the female. Green with black markings. Elytra grayish white. Length 9 4.25 mm., 3 3.5mm.

Vertex very long and acute in the female, resembling lautus, twice as long as the pronotum. Pronotum short, very strongly, produced between the eyes. Elytra long and slender, appressed behind; venation slightly obscure, the central anteapical cell strongly constricted behind the middle. Front very narrow and tumid, almost triquetrus above, convex below, clypeus almost circularly expanded at the base.

Color—Vertex bright green wavily lined with black, omitting a median line on the anterior half and a pair of slightly divergent lines midway between the median line and the eyes, pale green. Pronotum green anteriorly shading out to dirty grayish white on scutellum, disc with three narrow pale stripes bordered with brownish fuscous. A broad brownish fuscous stripe behind either eye continuing along the outer margin of clavus, becoming attenuate posteriorly and often paralleled by a brownish line on disc. Veins of corium except the outer fork of the first sector irrorate or margined with brown, a black spot on the apices of the first and third apical and the first four costal veinlets. The brown markings sometimes absent from the basal half of corium. Face green, upper half of front slightly lined with black, lower half yellowish.

Genitalia—Female segment short almost truncate, median half slightly roundingly produced behind; male, valve long, posterior margin semicircular, plates narrow triangular, exceeding the valve by about its length.

Described from four species from Tia Juana, California, collected by the author.

Platymetopius nigriviridis var. dixianus n. var.

Form of nigriviridis nearly, slightly smaller and with a slightly shorter, broader vertex. Color creamy buff with a trace of greenish on tip of vertex. Vertex with the dark markings of nigriviridis. Slight traces of the markings of nigriviridis on the pronotum and apical cells of elytra.

Described from four females from St. George, Utah, collected by the author. This pretty little form from Utah's

"Dixie" was at first thought to be distinct from the California species, but what appears to be an intermediate form was taken at Colfax, California.

Platymetopius majestus n. sp.

Form of elegans nearly, but with a longer vertex in the male. Tawny and chestnut brown, iridescent. Length & 4 mm.

Vertex, very long in the male over half longer than the pronotum, disc broad and flat the margins rounding to the rather blunt apex. Elytra moderately long and inclined to be flaring posteriorly. Venation obscure on the disc, the central anteapical cell slightly oblique and decidedly constricted behind the middle, outer anteapical cell oval, pointed in front. Front narrow slightly transversely convex, profile of upper half of face concave owing to the greatly lengthened vertex. Male, valve short broadly semicircularly rounding; plates short spoonshaped, upturned.

Color—Vertex yellowish buff, the median suture narrowly lined with white. Pronotum brown or ashy gray. Scutellum brown with orange shadings in the angles. Elytra subhyaline washed with iridescent smoky brown omitting the sutural margin, the costal margin behind the middle and a transverse band before the apex. In one specimen the inner part of corium on the basal half, the apical band and about five reflexed veinlets are smoky black. Face and below shining black a line under the vertex margin, a broader one below it, the hind femora, and the plates white.

Described from two males from Pasadena, California, collected by the author. This is a striking species with its iridescent elytra and black face. The female will undoubtedly have an extremely long vertex.

Platymetopius frontalis var. dorsalis n. var.

Size and form of frontalis, pale fulvous washed with tawny brown. Length, 4mm.

Vertex with the margins slightly rounding, creamy yellow. Pronotum and elytra fulvous shading to tawny brown just inside the costal margins of elytra and extending forward onto pronotum. Lateral margins of pronotum, the scutellum, base of costa and sometimes a spot on clavus pale yellow. Face and below pale yellow.

Described from two specimens from Onaga, Kansas.

There are few good structural characters available in this genus and much use has been made of color and markings in defining species. This distinct variety of which several other

specimens have been seen was at first considered as a distinct species, but it possesses the same genitalia and the characteristic venation of *frontalis* and may well be an extreme color variation of that species.

Platymetopius scriptus n. sp.

Resembling frontalis, but with a dark face and shorter vertex. Length 3 3.5 mm.

Vertex intermediate in form between frontalis and brevis about onethird longer on middle than against the eye, scarcely longer than the pronotum, disc slightly convex, the margin not produced. Face short straight, elytra broad, moderately short, the anteapical cells broad and parallel margined. Male valve long, broad, roundingly pointed, plates triangular, roundingly narrowing and then slightly produced at apex.

Color—Vertex brown with a line at the apex, an oblique dash on either side, a pair of irregularly quadrate spots on the anterior disc and another pair at the base tawny white. The quadrate spots often separated by a pair of light lines. Pronotum irregularly maculate with dark brown, traces of five light stripes. Scutellum, orange and brown. Elytra heavily irrorate with smoky brown, the costa lighter, usually the black nervures are very narrowly light margined and there are a number of ivory white dots in the ends of the cells, especially towards the apex. Face heavily irrorate with dark brown, the vertex margin narrowly light, as is also a short oblique crescent on the front just beneath the apex.

Described from five specimens, all males, from Onaga, Kansas. Readily separated from frontalis by the dark face and from fuscifrons by the shorter, stouter build and the parallel anteapicals.

Platymetopius abruptus n. sp.

Resembling frontalis, but larger, broader, and with a dark face. Length 4.25 mm.

Vertex broad, nearly right angled, broader and shorter than in frontalis, a third longer than the pronotum in the female, slightly longer than the pronotum in the male, elytra broad, venation regular, the anteapical cells parallel margined, about ten reflexed veinlets to costa. Face strongly sloping; profile straight.

Color—Male heavily irrorate and reticulate with dark smoky brown above, leaving but a few small dots and reticulations of the pale ground color visible. An ivory line on apical third of vertex and a narrower one along margin. Elytra with the usual ivory white dots in the ends of the cells. Face and below heavily irrorate with dark smoky brown. The

female is much paler throughout, the pale ground color predominating over the brown reticulations. The basal half of vertex, especially against the eyes, and the base of scutellum are washed with dirty orange. The face is heavily and evenly irrorate with brown.

Genitalia—Female segment very broad and short, the lateral angles distinctly, roundingly produced, posterior margin between the angles truncate with a broad shallow median notch which is heavily black bordered; male valve large broadly roundingly pointed, plates broad abruptly rounding, only appearing as a narrow margin under the valve. Entire genitalia black.

Described for a single pair from Arizona. The female is much lighter than the male, but the structural characters are the same.

√Scaphoideus bicolor n. sp.

Form and size of fumidus nearly, brown with the head and a broad stripe on the costa, lemon yellow. Length 4.75 mm.

Vertex, broad flat, right angled in front, slightly shorter than in blandus. Elytra long and narrow venation as in blandus, obscured by the color. Face sloping, slightly convex in profile, front very broad above rapidly narrowing to the almost parallel margined clypeus.

Color—Vertex lemon yellow, a faint black line on the anterior margin. The disc often washed with pale brown, omitting a median white line. Pronotum heavily irrorate with brown omitting a narrow anterior margin and the broad lateral margins behind the eyes. Scutellum castaneous with a broad median yellowish stripe. Elytra rich brown except for a broad lemon yellow costal stripe extending to the apical cells and a few pale spots in the cells. Face and below lemon yellow, legs and ovipositor infuscate.

Genitalia—Fémale segment rather long, nearly truncate posteriorly, the median half slightly rounding with a median notch either side of which appears a faint rounding projection; male, valve small triangular, plates broad at base roundingly narrowing and then attenuately produced.

Described from six specimens from Tia Juana, California, collected by the author.

Neocoelidia candida n. sp.

Resembling lactipennis, but longer and with a much broader head. Length 4.25 mm.

Vertex as broad as its median length, bluntly oval in front scarcely conically pointed, disc convex, rounding to the front without trace of a margin except at apex. Front tumid as in *lactipennis*, pronotum much more excavated behind than in *lactipennis*, anterior and posterior

margin parallel, lateral angles broadly rounding. Elytra broad and short, venation distinct, the outer fork of first sector usually forkin; to form a closed anteapical cell,

Color—Pale greenish white, vertex and front pale dirty straw color a black spot at apex, and sometimes a pair of quadrangular brown spots on disc. Two black points on scutellum, sometimes wanting, elytra powdered or milky white, sometimes greenish white, the nervures pale brown. Sometimes the apical cells are clouded with brown and the nervures between them are then broadly light.

Genitalia—Female segment long and narrow curved around the ovipositor, truncate posteriorly, the median half slightly angularly produced; male, valve broad at base, a little longer than its basal width apex acute, two round black spots on the disc.

Described from eight examples from the southern parts of Utah and Colorado.

Neocoelidia reticulata n. sp.

Resembling candida in form, smaller. Green with reticulate veined elytra. Length scarcely 4mm.

Vertex broad, slightly longer than wide, bluntly conical the disc inclined to be flat but scarcely separated from front. Elytra moderately long, slightly exceeding the abdomen, venation coarsely and irregularly reticulate. Female segment moderately long, the posterior margin broadly evenly rounding.

Color—Vertex and front pale green a black spot on apex, pronotum pale green, an oblique milky dash on either side the anterior disc. Scutellum pale green the median line milky, expanding just before the apex into a triangular spot, a pair of black points on the lateral margin. Elytra milky or greenish white, pruinose, the reticulate venation dirty greenish brown.

Described from three females from Tia Juana, California, collected by the author. Readily separated from all other species by the reticulate venation.

Neocoelidia compta n. sp.

Form of candida nearly, narrower with slightly longer elytra. Creamy white with three pairs of dark spots. Length 4.75 mm.

Vertex a trifle longer than its basal width, disc convex, apex distinctly conically pointed, vertex margin distinct from the eyes to apex. Pronotum rather long, parallel margined. Elytra moderately long, base of apical cells equalling the apex of ovipositor; venation obscure. Female segment very long, truncate or slightly emarginate posteriorly.

Color-Rich creamy white, a point on apex of vertex and a pair of

larger ones on scutellum shining black. A triangular mark just inside the middle of the claval area and an oblique one just before the apex of clavus extending out to inner sector of corium, dark brown. These two marks connected by a faintly outlined brown line which no doubt in darker specimens would represent the margin of a dorsal stripe.

Described from a single female from Mesilla, New Mexico (Cockerell).

Neocoelidia pulohella n. sp.

Resembling barratti, but with a narrower and less ornamented stripe. Elongated, pale green with a definite dorsal stripe. Length 9, 6.25 mm.; 3, 5.5 mm.

Vertex a trifle longer than its basal width, disc convex, apex distinctly pointed. Pronotum long, deeply and almost angularly excavated posteriorly. Elytra long and narrow, the apex of clavus equalling the apex of ovipositor, costal margin convex its entire length. Female segment long, truncate or slightly emarginate, male valve long, roundingly narrowing and acutely pointed.

Color—Pale greenish white, a broad median brown stripe extends from the black point on apex of vertex to the apex of clavus and a smoky brown stripe continues to apex of elytra. The brown stripe is margined with black from the base of the vertex back and varies in width as follows: Four regular oval enlargements on vertex, from which it regularly broadens to the base of the scutellum, then slightly narrows to the elytra, on the elytra there are three slightly angular enlargements increasing in size posteriorly. There is an irregular black spot just outside the apex of clavus on either side from which the smoky stripe takes its origin.

Described from five examples from Tia Juana, California, collected by the author. This species is much nearer to *lineata* than any other northern form.

Neocoelidia tripunctata n. sp.

Longer than compta, resembling pallida, but broader. Pale with three black spots and a median brown stripe. Length 5.25 mm.

Vertex slightly longer than wide, very bluntly conical with a trace of a carinate margin near the apex, front very broad and tumid. Elytra rather long, broad and flaring at base then narrowing to the appressed apex, giving the insect on oval appearance. Female segment moderately long, posterior margin roundingly truncate.

Color—Vertex and face creamy yellow, a large black spot on apex. Pronotum pale straw, a pair of faint brown stripes broadly margined exteriorly with milky white, scutellum milky, with a pair of shining black points. Elytra with a narrow common sutural stripe of rich brown margined either side with a broader stripe of milky white which shades out into the subhyaline white of the elytra.

Described from a single female from Arizona. A pale, but very pretty and distinct species.

A Partial List of the Lepidoptera of Pickaway County, Ohio.

By B. R. BALES, M.D.

The following list of the Lepidoptera of Pickaway County, Ohio, consists only of specimens actually taken within a radius of five miles of Circleville, the county seat, in 1907 and 1908, at odd times and spare moments in the active life of a general practitioner of medicine.

Being the list of the specimens taken in only two years, it must necessarily be incomplete, but I hope to supplement it with a further list of new specimens taken in 1909 and 1910.

Those species that I have classed as "common" or "rare," are only common or rare as I have found them in 1907 and 1908.

The collecting ground lies in the level, fertile valley of the Scioto River, and is mainly under cultivation, with an occasional tract of woodland. There are a number of small streams of varying size, near which are favorite places for both moths and butterflies. Pickaway County lies a little south of the center of Ohio.

The arrangement and sequence used by Dr. W. J. Holland in his Moth and Butterfly Books is followed, as far as possible, throughout the list.

I wish to acknowledge my indebtedness to Mr. Frank Haimbach, of Philadelphia, and Prof. Jas. S. Hine, of the Ohio State University, for kindly assistance in the identification of doubtful specimens.

RHOPALOCERA.

Anosia plexippus (Linn). Very common. An immense migrating army of this species passed through Circleville on October 4th, 1907. A record of this can be found in Entomological News, Vol. XVIII. No. 9, p. 402.

Argynnis cybele (Fab.). Common in the hay fields and meadows. Argynnis idalia (Drury). Not common. Several taken. Phyciodes nycteis (Doubleday & Hewitson). Not common. Phyciodes batesi (Reakirt). Common along the small water courses. Grapta interrogationis (Fab.) form fabrici (Edw.). Common.