

**Article XIX.—RECORDS AND DESCRIPTIONS OF
AUSTRALIAN ORTHOPTERA.**

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The material on which the present paper is based forms part of the Hy. Edwards Collection, now the property of the Museum. For the opportunity to study this material the author is indebted to Mr. William Beutenmüller, Curator of Entomology.

Eight new species and one new genus are here described, and of the six previously known genera represented in this series by new species three were hitherto unfigured.

FORFICULIDÆ.

Labidura truncata Kirby. Victoria. One male.

BLATTIDÆ.

Ischnoptera annulata Tepper. Victoria. One male.

Calolampra gracilis (Brunner). Victoria. One specimen. Tasmania.
One specimen.

Platyzosteria melanaria Erichson. Victoria. One immature female.

Oniscosoma castanea Brunner. Victoria. One male, two females.

Panesthia australis Brunner. Victoria. One female. Queensland.
One male.

ACRIDIDÆ.

Acrida nasuta Linnæus. Two males, one female.

Cryptobothrus¹ gen. nov.

Belonging to the Acridine group Gomphoceri and closer related to *Chorthippus* (*Stenobothrus*) than to the other genera of this group. As its general character is quite distinct from this genus a generic diagnosis is here given.

Form moderately compressed. Head with the face distinctly retreating, arcuate; fastigium trigonal, margins and apex acute, junction of the fastigium and frontal

¹ Κρυπτός hidden, βοθρος a pit or depression.

costa rounded; lateral foveolæ visible dorsad, longitudinal, impressed only by punctations; frontal costa sulcate ventrad of the ocellus; antennæ depressed, the distal section broader than the proximal. Pronotum with the caudal margin sub-rect-angulate, lateral carinæ distinctly converging caudad and slightly so cephalad, median carina distinct; lateral lobes deeper than long. Tegmina reaching beyond apex of abdomen; no stridulating field developed; no continuous intercalary vein present, an irregular substitute occupying the area. Wings ample. Caudal femora robust. Caudal tibiæ with eleven spines on the lateral margins, spurs slightly but not greatly unequal.

Type.—*C. chrysophorus* n. sp.

***Cryptobothrus chrysophorus*¹ n. sp.**

Type, ♂; Victoria, Australia. Edwards Coll., Amer. Mus. Nat. Hist.

Size small. Head with the occiput slightly elevated above the level of the pronotum, very gently arcuate, the interspace between the eyes equal to the fastigium in width, the latter being slightly less than twice the interantennal width of the frontal costa, margins slightly acute angulate, elevated, disk almost wholly depressed inside the margins, no median carina present, when viewed laterad the angle of the fastigium and frontal costa is moderately rounded; lateral foveolæ distinct for their entire length when viewed dorsad, the depressed area produced almost entirely by punctations and distinctly longitudinal, over twice as long as broad and with the

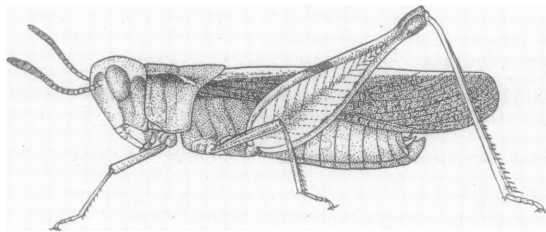


Fig. 1. *Cryptobothrus chrysophorus* gen. et sp. nov. Lateral view of type. (× 3).

dorso-cephalic angle broadly rounded; frontal costa from a very small dorsal width, regularly expanding to the region between the antennæ, subequal ventrad of this and becoming obsolete immediately dorsad of the clypeal suture, strongly punctate dorsad of the ocellus, sulcate ventrad; supplementary facial carinæ regularly but not strongly divergent; eyes ovoid, distinctly flattened cephalad, slightly prominent when viewed dorsad, in length distinctly exceeding the infra-ocular sulcus; antennæ slightly shorter than the head and pronotum together, apex blunt. Pronotum with the cephalic margin very slightly angulate, caudal margin rectangulate with very slight emarginations laterad; median carina distinct, lateral carinæ at the narrowest point (middle of prozona) separated by less than half the greatest area between them (on the metazona); prozona slightly shorter than the metazona; lateral lobes deeper than long, ventral margin obliquely emarginate cephalad, truncate caudad. Tegmina extending beyond the apex of the abdomen by the

¹ Χρυσόφορος, wearing gold.

length of the pronotum; costal margin with a small proximal lobe, distal half of the same margin arcuate, apex rounded. Wings with the greatest width contained about twice in the length; area between the caudal rami of the discoidal vein and the median vein rather broad and with seven arcuate transverse veins which are rather regularly placed, this area having somewhat the appearance of similar developments found in certain American Acridinæ (Truxalinæ). Interspace between the mesosternal lobes distinctly but not greatly transverse; mesosternal lobes subattangent. Cerci simple; subgenital plate conical, not distinctly produced. Caudal femora robust, the length about twice as great as that of the head and pronotum together, the greatest width contained about three times in the length, dorsal outline slightly concave distad, ventral outline regularly convex; caudal tibiæ slightly sinuate.

General color broccoli brown, marked and washed with bistre and buff. Face very pale buff, antennæ becoming bistre distad. Pronotum with the dorsal section of the lateral lobes on the prozona bistre, the same color lapping over narrowly on the dorsum of the metazona, lateral carinæ marked with pale buff; metazona on the lateral lobes washed with reddish. Tegmina with the anal field, and a narrow area adjoining the same, buff, the remainder of the tegmen closely maculate with bistre on a buff ground, the maculations small, but varying in size among themselves, subquadrate and not sharply defined except between the mediastin and humeral veins where six of the largest size are distinctly indicated. Wings with the apex and the better part of the anterior field washed with bistre, remainder lemon yellow, weak mesad, strong proximad. Caudal femora with a median maculation on the dorsal face and the genicular region bistre, internal face bistre with a pale pregenicular area, ventral sulcus except for a pale pregenicular space scarlet; caudal tibiæ scarlet, the genicular region bistre, the spines tipped with black; caudal tarsi washed with scarlet. Abdomen orange-red dorsad.

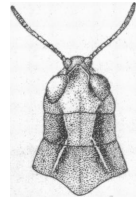


Fig. 2. *Cryptobothrus chrysophorus* gen. et sp. nov. Dorsal view of head and pronotum. (× 3.)

Measurements.

Length of body	14.5 mm.
Length of pronotum	3.5 "
Greatest width of disk of pronotum	2.5 "
Length of tegmen	13.8 "
Greatest width of tegmen	2.8 "
Length of caudal femur	10.3 "

The type is the only specimen of the species examined.

***Chortoicetes yorke townensis* Brancsik.**

Victoria. One female. This species was described from Yorketown, South Australia.

***Chortoicetes affinis* n. sp.**

Type, ♂; New South Wales, Australia. Edwards Coll., Amer. Mus. Nat. Hist. Allied to *C. yorke townensis* and *frater* Brancsik, but differing from the former in

the smaller size, the wholly sulcate frontal costa and some features of the coloration, while from the other species it differs in the larger size and in the cephalic margin of the wing not being infusate.

Size rather small; form elongate, moderately compressed. Head with the occiput and vertex distinctly elevated above the level of the pronotum, arcuate; interspace between the eyes slightly more than once and a half the inter-antennal width of the frontal costa; fastigium very slightly wider than the interocular space, about as long as broad, the margins regularly converging cephalad and separated at the apex by a slight space, the lateral margins continued ventrad into the frontal costa; lateral foveolæ visible dorsad for their entire length, sublanceolate, the greatest width caudad and contained about twice in the length; angle of the fastigium and face rounded when viewed laterad, face gently but very decidedly retreating; frontal costa regularly expanding from its junction with the fastigium, where it is about half the width it is at the ocellus, margins carinate, failing by a narrow space to reach the clypeal suture, sulcate through its length, but not so strongly dorsad as ventrad of the ocellus; eyes ovate, hardly prominent when viewed dorsad, in length distinctly but not greatly longer than the infra-ocular sulcus; antennæ slightly

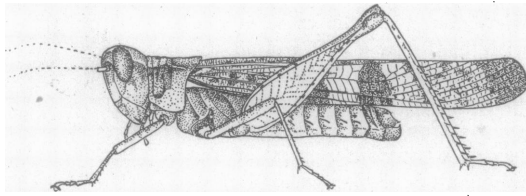


Fig. 3. *Chortoicetes affinis* n. sp. Lateral view of type. ($\times 2\frac{1}{2}$).

depressed. Pronotum very slightly depressed mesad; cephalic margin of the disk very slightly angulate, caudal margin rounded obtuse-angulate, lateral carinæ constricted near the middle of the prozona, diverging considerably and equally in proportion cephalad and caudad, median carina distinct, low; metazona slightly more than once and a half the length of the prozona; lateral lobes slightly deeper than long, ventral margin obtuse-angulate. Tegmina elongate, narrow, exceeding the apex of the abdomen by more than the length of the head and pronotum; costal margin with a very low, slightly marked, proximal dilation, apex rounded with a slight tendency toward oblique truncation; intercalary vein strongly developed, branching from the median vein at about two-thirds the length of the intercalary area, and as a whole lying closer to the median than to the ulnar vein, anterior intercalary area with a number of very short cross veins, posterior intercalary area with irregular oblique veins in the proximal half, but the distal half is supplied with nine or ten regularly spaced oblique cross veins separated by rhomboid spaces. Wings large. Interspace between the mesosternal lobes subquadrate, the angles of the lobes rounded. Cerci simple. Caudal femora of medium build, slightly less than two-thirds as long as the tegmina; caudal tibiae with ten spines on the lateral margins, spurs subequal.

General color wood brown marked with vandyke brown. Head with the face washed with cinnamon, dorsum of the head obscurely lined with vandyke brown, a narrow postocular streak of the same color also present; eyes raw umber. Pronotum with the dorsum touched with cinnamon on the prozona, blending into drab on the metazona, the dorsal section of the prozonal portion of the lateral lobes and the mesad margin of the lateral carinæ caudad of the constriction vandyke brown, the lateral carinæ ochraceous buff. Tegmina semi-hyaline with four patches of

vandyke brown extending caudad nearly to the posterior ulnar vein, the two median ones, placed near the middle of the tegmen, being very distinct and subquadrate, the proximal and distal ones irregular, the interspaces touched with buffy, apex and anal field with subquadrate blotches. Wings hyaline with the apex narrowly suffused with brown. Caudal femora with two faint bars on the dorsal face, lateral carinæ with a number of blackish-brown maculations, genicular region suffused, ventral sulcus flushed with pinkish-red; caudal tibiæ with the distal two-thirds pinkish, the genicular region vandyke brown, the proximal third very pale buff, spines and spurs tipped with buff; tarsi buffy.

Measurements.

Length of body	20.6 mm.
Length of pronotum	4. "
Greatest width of disk of pronotum	3. "
Length of tegmen	23. "
Length of caudal femur	12.8 "

The type is unique.

***Chortoicetes pusillulus* n. sp.**

Type, ♂; Victoria, Australia. Edwards Coll. Amer. Mus. Nat. Hist.

Allied to *C. jungi* Brancsik¹ but differing in the much smaller size, the absence of maculations on the anal area of the tegmina and of any reddish coloration on the limbs.

Size very small; form moderately slender. Head with the occiput distinctly and considerably ascending to the vertex, the width of the latter (interocular) about two and a half times the width of the narrowest part of the frontal costa; fastigium considerably declivent, the lateral foveolæ causing the distinct margins to be concavely convergent, the separation from the frontal costa being made by a poorly defined transverse ridge, the lateral carinæ of the costa being continuous with those of the fastigium; lateral foveolæ elongate subtrigonal; frontal costa slightly expanding ventrad except for an area in the vicinity of the median ocellus where it is subequal, distinctly but not greatly sulcate throughout except ventrad; eyes ovate, somewhat flattened cephalad, slightly prominent when viewed dorsad, the length considerably more than that of the infra-ocular sulcus; antennæ about half again as long as the head and pronotum together, apex acuminate. Pronotum slightly longer than the dorsal length of the head, cephalic margin of the disk gently arcuate, caudal margin obtuse-angulate with the apex rounded, lateral carinæ weak, strongly constricted at the middle of the prozona, the carinæ almost obsolete on the section of closest proximity; lateral lobes distinctly deeper than long, the ventral margin broadly obtuse-angulate. Tegmina somewhat exceeding the tips of the caudal femora, apical section slightly narrower than the median and curved somewhat toward the sutural mar-

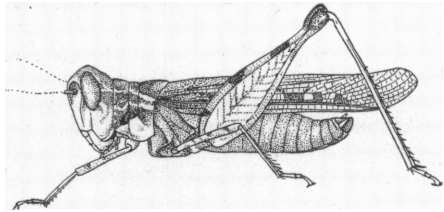


Fig. 4. *Chortoicetes pusillulus* n. sp. Lateral view of type. (× 3).

¹ Jahresb., Naturwiss. Ver. Trencsén. Comit., Trencsén, XIX-XX. pp. 70-71.

gin, apical margin rounded; intercalary vein nearer the median vein in the distal two-thirds, nearer to the ulnar vein in the proximal third. Wings ample. Interspace between the mesosternal lobes strongly transverse, the angles of the lobes obliquely rounded; interspace between the metasternal lobes very small, subquadrate. Caudal femora nearly two-thirds the length of the body, moderately robust, the greatest width contained nearly three times in the length, paginæ deeply sculptured; caudal tibiæ with ten spines on the lateral margins, spurs decidedly but not exceptionally unequal.

General color buff, marked and sprinkled with mummy brown. Head pale drab dorsad and bearing a pair of sub-equidistant lines of mummy-brown on the occiput and several short bars on each side caudad of the eyes; face and ventral portion of the head strongly yellowish buff; eyes tawny olive; antennæ indistinctly annulate with brownish, the apex darker than the base. Pronotum with the disk and the dorsal half of the lateral lobes washed with mummy brown, the median section of the prozona, the caudal section of the metazonal disk and the lateral carinæ buffy, the carinæ of the metazona being broadly and distinctly marked, a poorly defined pale oblique line is present on the dorsal section of the lateral lobes, line of darker color on the lateral lobes sigmoid and bordered with blackish on the prozona. Tegmina buffy proximad, hyaline distad, a series of about seven subquadrate blotches of mummy brown placed in a longitudinal series extending three-fourths the length of the middle of the tegmina. Wings hyaline. Caudal femora with several dorsal patches, one indistinct and proximal, one median and large, another pregenicular, a fourth involving the genæ and lobes, these blotches extending a considerable distance ventrad on the internal face, external face with shadowy indications of several oblique bars, marginal carinæ of the external face punctate with blackish-brown, particularly the ventral one; caudal tibiæ very weak olive-yellow, the spines blackish for at least half their length.

Measurements.

Length of body	12.5 mm.
Length of pronotum	2.5 "
Length of tegmen	11.5 "
Length of caudal femur	8.1 "

A topotypic male has also been examined. It is somewhat smaller than the type and of a more sharply contrasted coloration. The oblique bars on the lateral face of the caudal femora are well defined, and the carinæ without maculations, the dorsum of the head and pronotum has a median longitudinal subequal pale bar and the extreme apex of the wing also has sub-linear markings.

Aiolopus tamulus (*Fabricius*). New South Wales. One female.

Ædaleus marmoratus (*Thunberg*). Victoria. One female.

Ædaleus nigro-fasciatus australis *Saussure*. New South Wales. One female.

Ædaleus senegalensis *Krauss*. New South Wales. One male. This species has been recorded from Australia by Saussure.

Atractomorpha australis n. sp.

Type, ♀; New South Wales, Australia. Edwards Coll., Amer. Mus. Nat. Hist.

Closely allied to *A. australiana* Bolivar from Rockhampton, Queensland, but differing in the shorter head and fastigium, the shorter tegmina and decidedly shorter and narrower wings and longer caudal limbs.

Size medium; form as usual in the genus. Head on the dorsum nearly two-thirds the length of the pronotum; occiput hardly arcuate; fastigium slightly longer than broad, tapering, the apical margins curved but the apex not distinctly rounded and with a slight angulation; frontal costa narrow, compressed between the antennæ, slightly expanded immediately ventrad, subequal thence to the clypeal suture except for a slight expansion around the ocellus, shallowly sulcate except in the constricted dorsal section; face very greatly retreating, concave; eyes sub-ovoid, slightly flattened caudad, length slightly less than that of the fastigium; tubercles ventro-caudad of eye distinct and rather large; antennæ distinctly but not greatly shorter than the pronotum, thick, apex slightly tapering. Pronotum with the cephalic margin of the disk sub-truncate, caudal margin obtuse-angulate with a shallow median emargination, lateral angles of the disk carinate on the cephalic two-thirds of the prozona, distinct but not carinate on the remaining por-

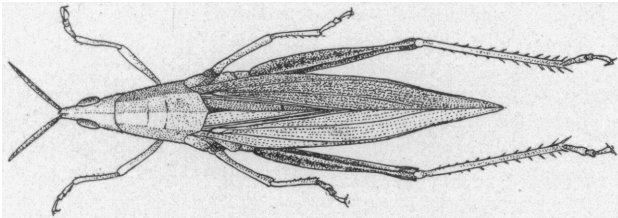


Fig. 5. *Atractomorpha australis* n. sp. Dorsal view of type. ($\times 1\frac{1}{2}$.)

tions, the greatest caudal width of the disk contained about two and one-third times in the length, median carina distinct, prozona occupying about three-fifths the length of the pronotum, disk of the metazona irregularly lineato-rugose; lateral lobes nearly twice as long as deep at the ventro-caudal angle, ventral margin oblique, following the line of tubercles ventro-caudad of the eye and provided with excrescences of the same character, caudal margin rotundate-emarginate. Tegmina about twice as long as the head and pronotum together, elongate lanceolate, costal margin with a moderate proximal lobation. Wings about two-thirds the length of the tegmina, narrow, the width contained three times in the length; apex acute. Prosternal projection transverse, truncate; interspace between the mesosternal lobes slightly transverse, the cephalic width slightly greater than the caudal; interspace between the metasternal lobes strongly transverse, very shallow. Caudal femora as long as the abdomen, slender, tapering in the distal two-thirds, pattern of the paginæ almost obsolete; caudal tibiæ about five-sixths the length of the femora, lateral margins with ten spines, internal margins with eleven.

General color chrome yellow, olive-yellow on the caudal section of the pronotal disk; tegmina olive-yellow; wings pale olive-yellow along the veins of the anterior field, posterior field suffused with geranium pink, the color becoming weaker distad and always stronger along and in the immediate vicinity of the dorsal veins.

Measurements.

Length of body	32. mm.
Length of head (dorsal)	5. "
Length of pronotum	8. "
Length of tegmen	25. "
Greatest width of tegmen	4. "
Length of wing	17.3 "
Greatest width of wing	5.6 "
Length of caudal femur	16.3 "

The type is the only specimen of the species seen.

*Azelota Brunner.**Azelota diversipes* n. sp.

Type, ♂; Victoria, Australia. Edwards Coll., Amer. Mus. Nat. Hist.

As no described species have been assigned to this genus no comparisons can be made.

Size medium; form somewhat compressed, fairly robust; surface of the head and thorax, rugose, rugulose or punctate. Head with the occiput slightly elevated about the disk of the pronotum, moderately arcuate but slightly flattened, area between the eyes about twice the width of the frontal costa at the ocellus and provided with three longitudinal carinæ, the lateral ones being short, the median continued over the occiput; fastigium very slightly declivent, slightly longer than broad, lanceolate, the greatest width caudad, margins distinctly carinate, the disk moderately excavated; lateral foveolæ hardly appreciable; angle of the fastigium and frontal costa moderately rounded when viewed laterad; face distinctly but

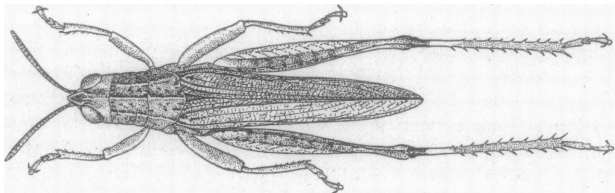


Fig 6. *Azelota diversipes* n. sp. Dorsal view of type. (× 2.)

not greatly retreating; frontal costa gradually but slightly expanding from the narrow dorsal section, sulcate ventrad of the ocellus and for a short distance dorsad of it; eyes ovate, slightly flattened cephalad, slightly prominent when viewed dorsad, in length nearly twice that of the infra-ocular sulcus; genæ rugose; antennæ slightly shorter than the head and pronotum together, distinctly depressed, slightly tapering distad, apex blunt. Pronotum with the disk nearly twice as long as the greatest caudal width of the same, cephalic margin of disk moderately arcuate, caudal margin obtuse-angulate in general form but in detail with a principal median arcuation and a pair of lateral ones, thus making a situation in the margin each side of the apex; lateral margins with low carinæ slightly expanding caudad, severed by at least two principal transverse sulci; median carina distinct, moderately high, slightly sinuate, divided, but not deeply, by the principal sulcus; metazona and pro-

zona subequal in length; disk with scattered subparallel linear rugosities; lateral lobes very slightly longer than deep, ventral margin obtuse-angulate, caudal margin oblique, slightly sinuate, prozona irregularly rugose, metazona closely rugulose. Tegmina reaching slightly beyond the apex of the abdomen; costal margin with a considerable proximal expansion, the distal third of the margin arcuate; apex rotundato-truncate; no intercalary vein present. Wings ample, width contained nearly twice in the length, apex blunt. Prosternal process transverse, strongly deflected caudad and distinctly broader at the apex than at the base, the apical margin with a slight median emargination; interspace between the mesosternal lobes subquadrate in proportions, subcuneiform in shape, the greatest width caudad; metasternal lobes subattinent. Abdomen considerably compressed; cerci about half again as long as the proximal width, sub-lanceolate, apex rather blunt and slightly decurved; subgenital plate subconical when viewed caudad, the apex narrow and very slightly divided. Cephalic and median limbs robust, femora, particularly the cephalic, inflated, cephalic femora moderately curved. Caudal femora about as long as the dorsal length of the abdomen, robust, the greatest width contained about three times in the length, dorsal carina sparsely serrate, ventral carina considerably arcuate, pagina distinctly and regularly but not deeply sculptured; caudal tibiae about four-fifths the length of the femora, rather stout, supplied with eight strong spines on the lateral and nine on the internal margins, the apical spine on the lateral margins being absent, internal spurs subequal.

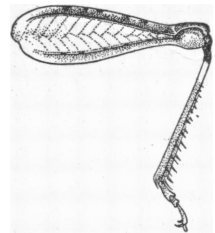


Fig. 7. *Azelota diversipes* n. sp. Lateral view of caudal limb. ($\times 1\frac{1}{2}$).

General color broccoli brown, inclining slightly toward greenish, ventral surface of the abdomen yellowish, eyes wax yellow; wings hyaline except for a slight apical suffusion, principal veins in other than the radiate field brown; caudal femora with the lateral and dorsal carinae touched at regular intervals with blackish, genicular region suffused with dark brown, several obscure transverse bands are indicated on the internal face, the dark bars being blue black; caudal tibiae with a dark genicular region, blackish on the inner face, a light pregenicular annulus is maize yellow on the internal face and hardly appreciable on the external, remainder of the tibia washed with heliotrope purple, particularly on the dorsal and internal faces, spines and spurs dull yellow with the apical half blackish; caudal tarsi carmine.

Measurements.

Length of body	22.5 mm.
Length of pronotum	5.2 "
Greatest caudal width of disk of pronotum	3.1 "
Length of tegmen	16.2 "
Greatest width of tegmen	3.5 "
Length of caudal femur	13. "

A paratypic male has also been examined and in all structural characters it fully agrees with the type although slightly smaller. In color it is distinctly darker, more olive than brown appearing in the general color, the disk of the pronotum, however, being rather ferruginous and dark along the median carina, while the lighter color is continued on the anal field of the tegmina.

***Exarna rugosa* n. sp.**

Type, probably female;¹ Victoria, Australia. Edwards Coll., Amer. Mus. Nat. Hist.

Allied to *E. despecta* Brancsik² from Yorketown, South Australia, but differing in the larger size, the sulcate ventral portion of the frontal costa, the less depressed and more cristate pronotum and the longer tegmina, as well as details of the coloration.

Size medium; form moderately robust; surface rugose as well as punctate. Head well placed within the pronotum, short, deep; occiput strongly and irregularly rugose, the interspace between the eyes slightly more than half the cephalo-caudal width of the eye; fastigium with the greatest width slightly greater than the length, the disk, however, with the dimensions subequal and crudely hexagonal, the side at the junction with the frontal costa shorter than the others, open caudad, moderately excavate, a slight longitudinal median depression being noticed as well as two pairs of low, small tubercles placed about in the center; lateral foveolæ not

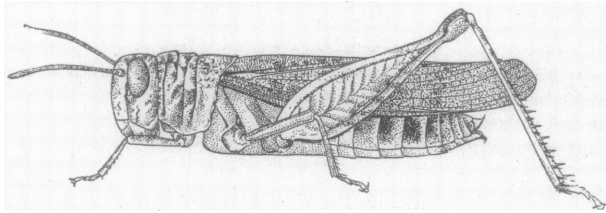


Fig. 8. *Exarna rugosa* n. sp. Lateral view of type. ($\times 2$.)

marked, their usual situation being occupied by a number of low excrescences; frontal costa forming a slight angle with the face when viewed laterad, the costa itself being narrow dorsad, slightly expanding between the antennæ, from whence the width is subequal to the clypeal suture except for a slight constriction immediately ventrad of the ocellus, the section ventrad of the ocellus is distinctly sulcate, the dorsal section bears an irregular median carina due to the two parallel rows of irregular punctures, fastigium separated from the frontal costa by a transverse carina slightly weaker and lower than the lateral carinæ of the fastigium and costa; eyes subreniform, slightly prominent when viewed from the dorsum, in length distinctly longer than the infra-ocular sulcus; antennæ slightly shorter than the head and pronotum together, slightly depressed, blunt. Pronotum slightly inflated, punctate, sparsely but distinctly rugose, the length slightly more than the greatest caudal width of disk; cephalic margin gently arcuate, caudal margin obtuse-angulate, the angle blunt and the sides distinctly emarginate, laterad the disk rounds into the lateral lobes except on the metazona where a shoulder is noticeable; median carina cut by two transverse sulci, the metazona and prozona being subequal in length, the two sections into which the carina of the prozona is divided each being distinctly but not greatly elevated caudad, the metazonal portion of the carina being quite low; lateral lobes nearly equally as long as deep, the ventral margin

¹ The apex of the abdomen is missing.

² Jahreshb. Naturw. Ver. Trenc. Comit., Trencsén, XIX, p. 77, pl. iii, fig. 19.

obtuse-angulate, the surface of the lobes with three well marked sulci; the prozonal disk with irregular rugosities, the metazona with few rugosities and these longitudinal, parallel and limited to the cephalic section of the metazona. Tegmina about three and two-thirds times the length of the pronotum, apical section somewhat narrowed and apex rounded oblique subtruncate; intercalary vein absent, the area being filled with irregularly disposed nervures. Wings ample, the greatest width contained about two and one-fourth times in the length. Prosternal process erect, quite broad, blunt; interspace between the mesosternal lobes subquadrate, slightly narrower than the lobes; interspace between the metasternal lobes small, cuneiform. Cephalic limbs small and weak; median limbs slightly longer and more robust than the cephalic. Caudal femora nearly three-fourths the length of the tegmina, the greatest width contained about three and one-half times in the length, of medium build, dorsal carina distinctly serrate, paginæ well sculptured with ten to eleven chevrons; caudal tibiæ slightly shorter than the femora, external margin with eight or nine spines, no apical one present, internal margin with ten spines, internal spurs moderately long, subequal.

General colors drab and isabella color with an olive-greenish tendency on parts of the head and pronotum, the two base colors mingled and scrambled together, contrasting only on the tegmina; eyes clay color, antennæ clove brown. Tegmina with scattered small quadrate maculations of drab, thickest and not so sharply defined about in the middle of the tegmina, weak on the distal third, almost absent from the sutural portion of the anal field. Wings chrome yellow in the proximal half shading into drab distad, the coloration being almost entirely on the veins. Abdomen with the segments strongly marked with clove brown on their proximo-lateral sections. Caudal femora with their carinæ regularly marked with clove brown, the pattern of the paginæ finely and closely dotted with the same, genicular arches drab, internal face with traces of three transverse bands dorsad, ventral portion and ventral sulcus carmine; caudal tibiæ carmine, rather purplish and blotched with buffy on the dorsal face, spines and spurs buffy with the tips black, tarsi mottled drab and wood brown.

Measurements.

Length of body (approximately)	27. mm.
Length of pronotum	5.5 "
Length of tegmen	21. "
Length of caudal femur	14.75 "

The type is unique.

Macrotona gracilis n. sp.

Type, ♀; Victoria, Australia. Edwards Coll., Amer. Mus. Nat. Hist.

Closely allied to *M. lineola* Brancsik¹ from Yorketown, South Australia, but differing in the slenderer body and narrower pronotum, shorter antennæ (considerably less than equal to the head and pronotum in length) and in some details of the coloration of the pronotum and caudal tibiæ.

Size medium; form rather slender, not noticeably compressed; surface smooth or very finely punctate. Head as long as the pronotum, occiput slightly but dis-

¹ Jahresh., Naturw. Ver. Trenc. Comit. Trencsén, XVII, p. 256.

tinctly elevated above the disk of the pronotum, moderately arcuate and gently declivent to the apex of the fastigium, interspace between the eyes about two-thirds the width of one of the same; fastigium slightly produced, acute-angulate,

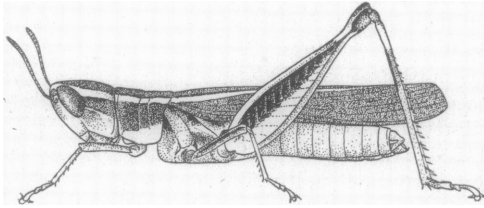


Fig. 9. *Macrotona gracilis* n. sp. Lateral view of type. ($\times 2$.)

apex blunt, broad and rounded ventrad into the face, margins low and thick, disk very slightly excavate; outline of the face when viewed laterad strongly retreating; frontal costa regularly expanded ventrad from its junction with the fastigium, where it is nearly three times the width of the proximal antennal joint, the section ventrad of the ocellus without sharply defined margins, the whole not sulcate and with two rows of sparse punctures dorsad of the ocellus; eyes acute ovoid, flattened cephalad, not prominent, in length about three times that of the infra-ocular sulcus; antennæ as long as the head and half of the pronotum, depressed, apex blunt. Pronotum with the disk subequal in width, slightly expanding on the metazona, the median width contained once and a half in the length, cephalic margin subtruncate, caudal margin very slightly obtuse-angulate; median carina distinct, moderately high, cut by the principal sulcus slightly caudad of the middle, the other sulci not severing the carina; lateral angles distinct but not carinate, slightly rounded on the metazona; lateral lobes longer than deep, the caudal margin quite oblique and distinctly emarginate, ventral margin obtuse-angulate. Tegmina more than twice the length of the head and pronotum and reaching to the apex of the abdomen, narrow, the greatest width being contained nearly six times in the length, subequal, the apex bluntly rounded; costal margin with a very slight proximal expansion; intercalary area occupied by an irregular, sinuate vein; mediastine and axillary veins strongly developed, the latter quite straight. Wings long and rather narrow, the costal margin gently sigmoid. Prosternal process broad, strongly transverse, the apical width greater than the proximal, the apical margin and the cephalic side of the apex roundly emarginate, the whole slightly depressed; interspace between the mesosternal lobes clepsydral, narrow, the length greatly exceeding the width; metasternal lobes contiguous caudad. Cephalic and median limbs slender. Caudal femora distinctly more than half the length of the body, well shaped, the proximal expansion contained slightly more than four times in the length, the pregenicular portion slender, the ventral outline less curved than the dorsal, carinæ smooth, paginæ with the pattern distinctly but not deeply sculptured, distinctly chevron-shaped; caudal tibiæ distinctly shorter than the femora, armed on the lateral margins with eleven or twelve and on the internal margins with twelve or thirteen spines, the lateral margins without apical spine; internal spurs subequal, strongly falcate.

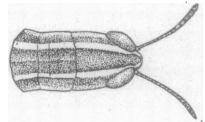


Fig. 10. *Macrotona gracilis* n. sp. Dorsal view of head and pronotum. ($\times 2$.)

General colors buff-yellow and bistre. Head buff-yellow ventrad, dorsad with a pair of chrome yellow bars extending from the sides of the fastigium caudad, moderately diverging, very narrow where they pass along the dorsal margin of the eyes

and moderately broad caudad, the enclosed dark median section being margined laterad by velvety clove brown, the dark post-ocular bar moderately wide, broadening caudad and with a slight line of chrome yellow along its ventral border; eyes burnt umber; antennæ buffy proximad, bistre distad. Pronotum with the chrome yellow bars of the head continued along the lateral angles, subequal in width to the portions on the caudal sections of the head, slightly widened caudad, the dark median area bordered as on the head; lateral lobes with a broad bistre area dorsad, the cephalic margin for a considerable distance yellow as is the ventral section, thus limiting the cephalic marginal width of the brown to that of the postocular bar of the head with which it is continuous, ventral margin of the blotch slightly oblique, ventro-caudad in direction. Tegmina with the anal vein marked with a continuation of the chrome yellow bands, gradually becoming obsolete, remainder of the tegmina with the venation and some indistinct blotches and clouds on the membrane bistre. Wings with the apex narrowly clouded with drab. Pleura with the bistre and yellow division of the lateral lobes of the pronotum continued on them, a space in front of the articulation of the caudal limbs also bistre. Ventral surface and abdomen buff-yellow the latter with the faintest suggestion of orange-buff dorsad. Cephalic and median limbs buff-yellow, touched with clay color, the femora lined laterad more or less distinctly with bistre. Caudal femora buff-yellow with the dorsal half to two-thirds of the paginæ clove brown, a pale pregenicular annulus not interrupted, the genicular region punctate and clouded with clove brown and bistre, internal face with two clove brown maculations, one occupying the proximal half, elongate and only on the dorsal half, the other in the distal third and covering the whole internal face, dorsal face with slight suffused indications of the internal maculations, ventral sulcus not marked with any dark color; caudal tibiæ with the distal half flame scarlet, a broad pregenicular annulus pale buff-yellow, the internal genicular section and the section between the flame scarlet and buff-yellow bistre, spines with half their length blackish; caudal tarsi touched dorsad with flame scarlet.

Measurements.

Length of body	25.6 mm.
Length of pronotum	4.2 "
Length of tegmen	18. "
Length of caudal femur	14.1 "

The type is the only specimen of the species seen by the author.

TETTIGONIDÆ.

***Acridopeza reticulata* Guérin.** Victoria. One female.

***Ephippithya biramosa* n. sp.**

Type, ♂; Queensland, Australia. Edwards Coll., Amer. Mus. Nat. Hist.

Closely allied to *E. trigentiduo-guttata* Serville, but differing in the biramosa median vein of the tegmina, the foramina of the cephalic tibiæ being more elongate and the tegminal maculations distinctly smaller. Comparison has been made with Sydney specimens of *E. trigentiduo-guttata*.

Size rather large; form as usual in the genus. Head with the occiput considerably inflated, globose; fastigium of the vertex very narrow, sulcate, provided with a slight proximal inflation; facial fastigium rather short, not touching the fastigium of the vertex; eyes ovate, very prominent, infraocular region with a low carinæ; antennæ very considerably exceeding the body in length, filiform. Pronotum subsellate, the disk, however, flat; cephalic margin very slightly emarginate, caudal margin flattened arcuate, the disk much constricted on the prozona and strongly expanded on the metazona where it is slightly concave; lateral lobes not separated from the disk by any sharply defined shoulder, the nearest approach to such being on the metazona, the depth of the lobes distinctly greater than the dorsal length, ventral margin strongly arcuate. Tegmina elongate, lanceolate, the greatest width at a third the distance from the base, the same dimension being contained nearly five times in the length; costal margin gently arcuate in the proximal half, straight thence nearly to the apex, sutural margin straight, apex narrowly rounded; costal field at no point more than two-thirds the width of the remainder of the tegmen, irregularly areolate; median vein diverging slightly proximad of the middle and bearing two rather closely placed rami which reach the sutural margin. Wings very large, apex acute, costal margin slightly arcuate, ulnar vein with four rami in the distal two-thirds. Cerci falciform, slightly depressed at the apex and crossing one over the other. Prosternum without spines, mesosternum with acute

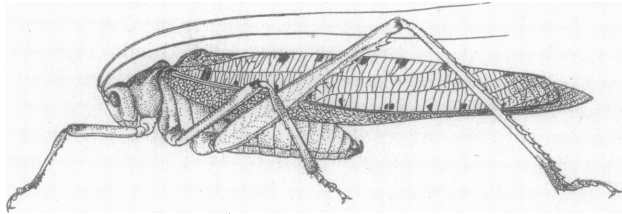


Fig. 11. *Ehippithya biramosa* n. sp. Lateral size of type. Natural size.

trigonal lobes, metasternal lobes sub-rectangulate caudad. Cephalic femora about equal to the head and pronotum together in length, slightly compressed, cephalic margin armed with six spines, caudal margin unarmed; cephalic tibiæ very slightly longer than the femora, foramina elliptical on both faces, ventral margins well spined, the dorso-caudal margin with four spines, the dorso-cephalic unarmed. Median femora slightly longer than the greatest width of the tegmina, ventral margins somewhat lamellate, particularly distad, the cephalic armed with eight spines, genicular lobes both armed with a long spine; median tibiæ slightly longer than the femora, compressed, considerably expanded in the proximal-third, cephalo-dorsalo-cephalic margin with three and the dorso-caudad with six spines. Caudal femora somewhat shorter than the body, slender, the ventral borders sublammellate and armed with spines, those distad being large, those proximad small, eighteen to twenty in number on the lateral and sixteen on the internal margins; caudal tibiæ distinctly but not greatly longer than the femora, quadrate in section, all the margins spined, the dorsal ones with larger and more numerous spines than the ventral.

General colors pale olive-green and saffron yellow. Head with the interocular region and the top of the occiput bistre, face and sides of head cream buff; eyes clay color; antennæ greenish proximad becoming cinnamon-rufous distad and mesad,

the whole with the articulations usually indicated by pale annuli. Pronotum with the disk washed with brown, the narrow clepsydral cephalic section bistre with a narrow wood brown median line, the metazonal section russet with clove brown lateral portions; lateral lobes saffron yellow. Tegmina pale olive-green, the distal half of the costal field and the region between the discoidal and median veins brick red; sutural margin narrowly lined with the same color which is also shared by the tympanal venation; the area immediately mesad of the median vein decorated with six to nine small blotches of clove brown of variable size, several being as large as a millimeter and a half square while others are little more than points of color, sutural margin with six blotches of the same color which are a rule slightly larger and more quadrate. Wings hyaline, the veins pale greenish, coriaceous apex of the anterior field greenish, the distal section of the costal margin brick red. Abdomen greenish ventrad, vinaceous-rufous dorsad. Cephalic and median limbs dull saffron yellow, the genicular region of the femora and the caudal section of the genicular region of the tibiæ clove brown, foramina and articulation of the tarsi of the same color. Caudal femora greenish-yellow, spines tipped and genicular region edged with blackish brown; tibiæ the same color as the femora, suffused distad.

Measurements.

Length of body	32.5 mm.
Length of pronotum	6.1 "
Greatest caudal width of disk of pronotum	5.1 "
Length of tegmen	51. "
Greatest caudal width of tegmen	11.2 "
Greatest width of the costal field	4.8 "
Length of caudal femur	30. "

The type is the only specimen of the species examined.

***Cædicia olivacea* Brunner.** New South Wales. One male. New Zealand. One female.

These specimens have the tegmina narrower in width than twice the length of the pronotum as described by Brunner.

***Elephantodeta farinosa* Brunner.** New South Wales. One female.

***Conocephalus longiceps* Redtenbacher.** Queensland. One male.

This specimen is somewhat larger than the original measurements given by Redtenbacher, but the differences are not greater than those sometimes found in other species of the genus.

***Gryllacris major* Brunner.** Victoria. One female.

This specimen agrees fully with the description of the species except that the ovipositor is several millimeters shorter than the type measurement.

