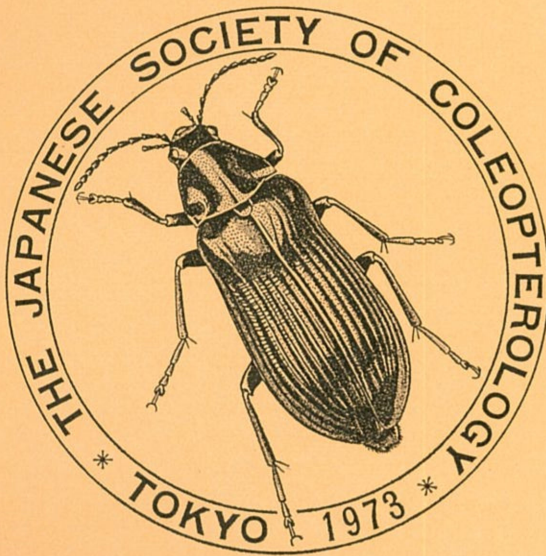


ISSN 0387-5377

ELYTRA



Vol. 13 No. 1

(Aug. 1985)

日本鞘翅目学会

The Japanese Society of Coleopterology

Tokyo

投稿規定

1. 会員は鞘翅目昆虫に関する報文を「ELYTRA」に投稿できる。報文が共著の場合は著者のうち1名は会員であることを必要とする。
2. 原稿の掲載可否および掲載時期については本会審査・編集委員会の合議による。
3. 原稿分量は原則として1号1篇あたり刷り上がり10ページまでとし、この分量を超える報文については超過分の経費を著者負担とするか、2回以上の分載とする。
4. 印刷代著者負担の原稿は、上記審査・編集委員会で承諾されれば指定の号に掲載することができ、また、ページ数の制限を受けない。
5. 和文原稿は横書きとし、原則として現代かなづかい、文体は「～である」調を用いる。欧文原稿はタイプライターで清書、行間はダブル・スペースとする。写真および図は出来上がり寸法の1.5倍程度に作製するとよい。
6. 報文原稿は表題、著者名、所属機関とその所在地あるいは住所（和文原稿ではこれらの欧文表記を加える）、Abstract、本文、摘要「Summary」（和文原稿では欧文で、欧文原稿では和文で作成）、文献の順に配列する。動植物の属以下の学名は、*Cerambyx cerdo* LINNÉ のように命名者まで全記し、それぞれ下線を引く。文献はアルファベット順に記載し、雑誌名および巻号は省略体でよい（下例参照）。

(例) KUSAMA, K., 1975. Notes on the longicorn genus *Necydalis*, homonym and synonym. *Elytra, Tokyo*, 2: 22.
7. 報文中の採集データは次のように略記されたい。

(例) 5♂♂, 1♀, Mt. Hotakasan, Gunma Pref., 16. VII. 1970, K. KINUGASA leg.
8. 新種・未記録種の記載および分類の紛らわしい種の記録を行なう場合には、かならず標本写真あるいはこれに代わり得る図を付し（とくに原記載の場合は holotype をかならず図示すること）、それらから種の特徴が判別困難なときには、別に部分図等によりこれを補うことが望ましい。
9. 原稿は編集委員会により一部変更されることがあるが、変更箇所が内容及ぶ場合はあらかじめ著者の了解を求める。また、不備な原稿は書き直しを要求することがある。
10. 活字の指定および校正は編集委員会に一任されたい。ただし、原著報文に関しては、初校は著者校正とするが、校正中の追加・変更は一切認めないので、完全原稿を旨とすること。
11. 別刷は原著報文に限って作成（50部以上）し、50部までは実費の半額を当会が負担、それ以上は著者の全額負担とする（送料は著者負担）。
12. 掲載済みの原稿は返却しない。ただし、原図・写真は投稿時にあらかじめ申し出があれば返却する（かならず送料同封のこと）。
13. 原稿の送付先は当分の間下記宛とする。

〒110 東京都台東区台東 2-29-6 藤田 宏方、日本鞘翅目学会編集局

Tenebrionidae of East Asia

(I) Tenebrionid Beetles from South Sumatra Collected by
Mr. Hiroshi MAKIHARA in 1983

Kimio MASUMOTO

15-9, Higashikamigo-cho, Totsuka-ku, Yokohama City 247, Japan

Abstract Nine new species of Tenebrionidae from South Sumatra collected by Mr. Hiroshi MAKIHARA are described and a list of the collection is also given.

Through the kindness of Mr. Hiroshi MAKIHARA (Forestry and Forest Products Institute, Ministry of Agriculture, Forestry and Fishery), I had an opportunity of examining many tenebrionid specimens collected in Benakat, southern Sumatra. I tried to determine them by comparing with the identified material at Budapest, Paris and London in February, 1985. I was able to determine most of them including some new species, but was compelled to leave some species undetermined.

From Sumatra, FAIRMAIRE, GEBIEN and some other authors described many tenebrionid species. Besides, not only the above authors but also PIC, BLAIR, KASZAB, KULZER and others described numerous species from adjacent regions. In some cases, a species was given several names by different authors. I am certain that there are other new species among the undetermined material, but prefer to refrain from describing them as new ones because more careful examination is needed for avoiding further confusion.

In this paper, I am going to describe 9 new species and also to give a list of determined and undetermined species with some comments.

Dr. Z. KASZAB (Természettudományi Múzeum, Budapest) kindly helped me to determine the names of many specimens, Dr. C. GIRARD (Muséum National d'Histoire Naturelle, Paris) permitted me to examine the tenebrionid specimens under his care, and Messrs. M. E. BACCHUS, M. J. D. BRENDILL and L. JESSOP (British Museum (Natural History), London), gave me the opportunity of comparing Sumatran specimens with identified material from adjacent regions. Mr. S. KONDO gave me valuable information, Mr. T. ENDO prepared the fine figures and Prof. M. SATÔ (Nagoya Women's University) kindly read the manuscript of this paper. I would like to express my sincere thanks to all of the above gentlemen for their kind support and assistance.

All the holotype specimens are preserved in the National Science Museum (Natural History), Tokyo.

Descriptions of the New Species*Falsonannocerus makiharai* sp. nov.

Brown, with inner sides of eyes, lateral portions of pronotum, tops of catenules on elytra, tibiae and tarsi blackish brown; moderately, somewhat vitreously shining; surface partly covered with yellowish secretion. Elongate; subcylindrical.

Head transverse-oblong, rather vertical against pronotum in repose, closely, deeply punctate, finely tubercular, raised posteriorly, with fronto-clypeal border deeply sulcate and arcuate posteriad; clypeus transversely elliptic, microscopically tuberculate and reticulate, weakly truncate in front; genae obliquely, feebly produced; eyes medium-sized, convex laterad, distance between them about 2.8 times their transverse diameter; ocular sulci very deep; tempora slightly pointed laterad just behind eyes; antennae medium-sized, reaching basal $2/5$ of pronotum, 6 apical segments flattened and club-like, 10th widest, 11th ovoid, relative length of each segment from basal to apical as follows: 2.2, 1.0, 1.9, 0.9, 0.8, 1.1, 1.1, 1.2, 1.3, 1.5, 2.6.

Pronotum trapezoid, 1.3 times as broad as long, broadest just behind the line across front angles, gradually narrowed to rear; front border rather remarkably arcuate forward; basal border feebly arcuate posteriad; sides rather steeply declined with lateral margins weakly explanate anteriorly, crenulate and distinctly so in middle; front angles narrowly rounded; hind angles subrectangular; disk strongly convex longitudinally, coarsely pitted with protruding tubercles throughout. Scutellum subcordate, slightly elevated, sparsely tuberculate.

Elytra approximately twice as long as broad, 3.5 times the length and 1.5 times the breadth of pronotum, broadest at apical $1/3$, weakly narrowed to front and moderately narrowed to rear, narrowly rounded in apical portion; dorsum rather strongly, longitudinally convex, thickest at middle, lightly flattened behind scutellum; disk punctate-striate, punctures in striae small and rather closely set; intervals feebly convex, very conspicuously, irregularly catenulate in 3rd, 5th, 7th and 8th, with catenules in outer intervals smaller and more even with one another.

Mentum subcordate with truncate apex; gula rather wide and parabolic; terminal segment of maxillary palpus with arcuate outer side about 1.7 times the length of inner, 1.3 times the length of apical.

Prosternum microreticulate, strongly raised in intercoxal space; prosternal process semicircular, rimmed and depressed; mesosternum depressed, coarsely punctate anteriorly, rather strongly raised in Y-shape and coriaceous in posterior portion; metasternum coarsely punctate, weakly microreticulate laterally, scattered with fine tubercles. Abdomen strongly punctate, punctures finer and closer to apical portion.

Legs rather stout, coarsely and closely punctate, and more or less finely tuberculate, with each tibia weakly indented just before apex of inner side, relative length of each segment of pro-, meso- and metatarsi from basal to apical as follows: 1.8, 1.2, 1.3, 1.5, 5.4; 1.6, 1.4, 1.5, 1.3, 5.6; 2.6, 1.7, 1.8, 6.0, respectively.

Body length: 5.2–6.4 mm.

Holotype: ♂, Benakat (agroforestry), South Sumatra, Indonesia, 2. III. 1983, H. MAKIHARA leg. Paratypes: 4 exs., plantation site, 9. II.; 1 ex., nursery site, 25. II.; 1 ex., ditto, 26. II.; 1 ex., ditto, 28. II.; 1 ex., ditto, 4. III. 1983, H. MAKIHARA leg.

This new species is discriminated from the other known *Falsonannocerus* species by its body being coarsely punctate and finely tuberculate, pronotum with arcuate front border, and elytra conspicuously catenulate on 3rd, 5th, 7th and 8th intervals.

Chaetopsia sumatrensis sp. nov.

This new species resembles *C. angusticollis* GEBIEN, 1925, but is distinguished from the latter by the following characteristics:

Head strongly raised with obliquely protruding tubercles posteriorly; clypeus weakly and roundly produced forward; antennae with relative length of each segment from basal to apical: 3.2, 1.2, 2.0, 1.1, 0.9, 1.2, 1.5, 1.7, 1.7, 1.8, 3.0.

Pronotum about 0.9 times as broad as long, broadest at the line across front angles, strongly convex above and produced anteriorly; front border overlying vertex; disk very unevenly rugoso-punctate, sparsely covered with rod-like bristles, with longitudinal tumidities in anterior half. Scutellum linguiform, feebly elevated.

Elytra twice as long as broad, 3 times the length and 1.5 times the breadth of pronotum, broadest at apical 3/7; disk with rather irregular rows of non-striated punctures, rather sparsely covered with short rod-like bristles; catenules in intervals longer and stronger, not becoming smaller in outer portions; lateral margins more widely enveloping meso- and metasterna.

Under surface rather closely punctate, almost without bristles.

Legs with relative length of each tarsal segment from basal to apical: 2.0, 1.1, 1.3, 1.8, 4.5; 2.1, 1.4, 1.3, 1.5, 4.8; 3.8, 1.4, 1.4, 5.0, respectively.

Male genitalia as shown in Figs. 5–6.

Body length: 3.8–6.1 mm.

Holotype: ♂, Benakat (plantation site), South Sumatra, Indonesia, 23. II. 1983, H. MAKIHARA leg. Paratypes: 1 ex., plantation site, 9. II.; 1 ex., nursery site, 22. II.; 1 ex., ditto, 25. II.; 1 ex., ditto, 7. III.; 1 ex., natural forest, 17. III. 1983, H. MAKIHARA leg.; 1 ex., Allas Valley, vic. of Gumpang, N. Sumatra (in Természettudományi Múzeum).

Cneocnemis sumatrensis sp. nov.

Reddish brown, with head, lateral margins of pronotum and abdomen in parts darkened, eyes nearly black; moderately shining. Oblong; rather subparallel-sided; moderately, longitudinally convex.

Head somewhat transverse-octagonal, weakly convex above, moderately closely, fairly strongly punctate, punctures sparser in middle, closer and finer anteriorly; fronto-clypeal border slightly depressed with very fine suture; outer margin widely and

weakly arcuate in front, oblique on both sides, then feebly produced to both eyes; eyes transverse, weakly convex laterad, distance between them about 3 times their diameter; antennae medium-sized and club-like, reaching middle of pronotum, 6th to 10th segments dilated and transverse, 11th noticeably large and ovoid, relative length of each segment from basal to apical: 1.9, 0.8, 1.3, 1.1, 1.1, 1.1, 1.3, 1.5, 1.4, 1.6, 2.5.

Pronotum subquadrate, 1.3 times as broad as long, broadest at basal $3/5$; front border weakly trisinate; basal border very slightly arcuate posteriad, feebly sinuate on both sides and shortly straight in median $1/5$; sides gradually declined to sulcate lateral margins; front angles subrectangular with rounded corners; hind angles obtuse but angulate; disk moderately convex, rather strongly punctate, punctures closer laterally. Scutellum subcordate, smooth, sparsely scattered with fine punctures in basal portion.

Elytra about 1.7 times as long as broad, 2.4 times the length and nearly the same breadth of pronotum, broadest at middle, feebly narrowed forward and moderately, roundly so to rear; dorsum moderately convex above; disk rather strongly punctate-striate, punctures in striae rather small, distance between them about 1.5–2.5 times their diameter; intervals very feebly convex, weakly, rather transversely microreticulate, scattered with minute punctures; sides softly enveloping hind body.

Mentum short pentagonal and densely haired in male, closely punctate in female; gula short and inverted U-shaped; terminal segment of maxillary palpus with arcuate outer side about 1.8 times the length of inner, 1.5 times the length of truncate apical.

Prosternum rather closely punctate, finely so in raised intercoxal space, with blunt prosternal process; mesosternum strongly depressed, coarsely punctate, with V-shaped elevation on hind border; metasternum moderately closely punctate, with median impression in posterior $2/3$. Abdomen rather closely punctate, with 3 basal sternites nearly wholly wrinkled and each basal portion of 2 apicals wrinkled longitudinally.

Protibiae in male peculiar, gradually widened, a little twisted and thickened to apex, dentate downwards in apical half along outer margin, bent at apical $2/5$ on inner margin, ridged from before middle to apex on the under surface along inner margin and pointed both at apical $1/3$ and just before apex; in female, gradually widened to apex, dentate in apical $3/5$ along outer margin, very weakly but widely arcuate and shortly emarginate near base on inner margin.

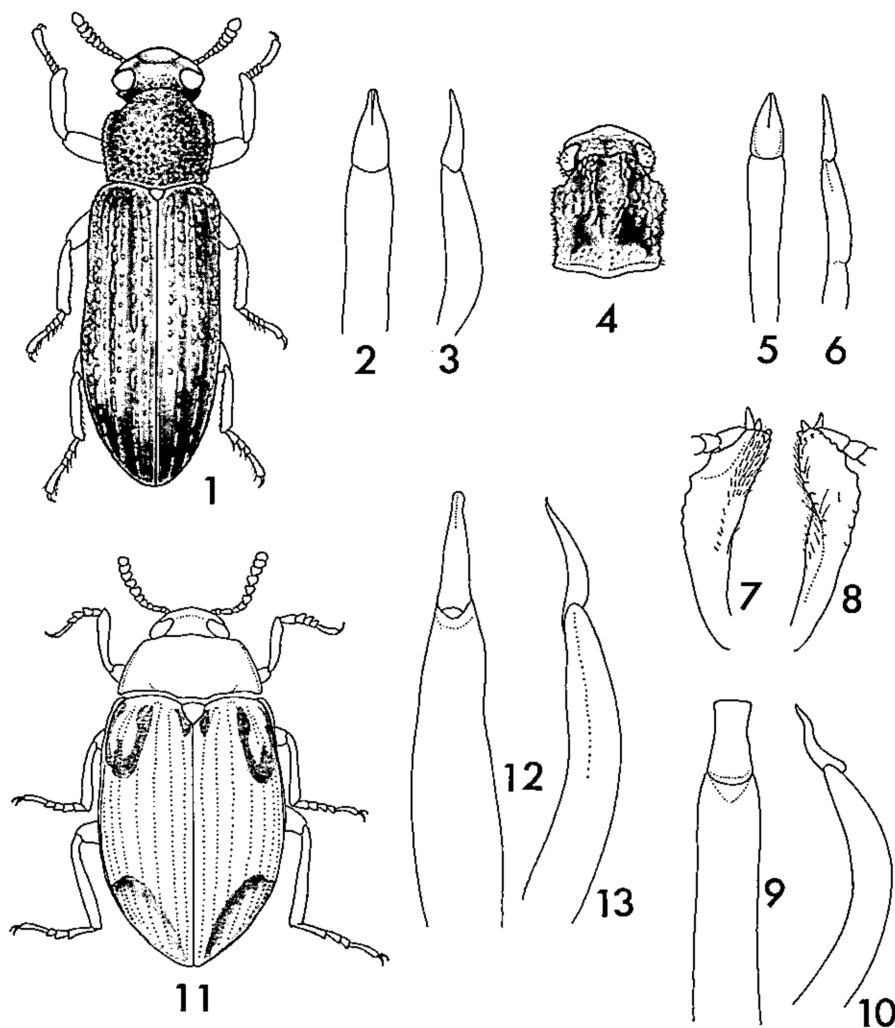
Body length: ca. 7 mm.

Holotype: ♂, Benakat (nursery site), South Sumatra, Indonesia, 10. II. 1983, H. MAKIHARA leg. Paratypes: 1 ex., nursery site, 5. II.; 1 ex., ditto, 6. II.; 1 ex., ditto, 7. II.; 3 exs., ditto, 9. II.; 2 exs., ditto, 10. II.; 2 exs., ditto, 16. II.; 1 ex., ditto, 7. III. 1983, H. MAKIHARA leg.

This new species is easily distinguishable from other *Cneocnemis* species by its remarkable protibiae, male mentum and genitalia.

Hemicera empatanda sp. nov.

Dark blackish brown, with basal half of each antenna, mouth parts, gula, meso-



Figs. 1-13.—1, *Falsonamocerus makiharai* sp. nov., dorsal view; 2, ditto, male genitalia (dorsal view); 3, ditto, male genitalia (lateral view); 4, *Chaetopsia sumatrensis* sp. nov., fore body; 5, ditto, male genitalia (dorsal view); 6, ditto, male genitalia (lateral view); 7, *Cneocnemis sumatrensis* sp. nov., protibia (dorsal view); 8, ditto, protibia (ventral view); 9, ditto, male genitalia (dorsal view); 10, ditto, male genitalia (lateral view); 11, *Hemicera empatanda* sp. nov., dorsal view; 12, ditto, male genitalia (dorsal view); 13, ditto, male genitalia (lateral view).

sternum, basal portion of each leg, and tarsi more or less lighter in color, upper surface bearing reddish violet tinge, head and pronotum partly feebly cyanetic, elytra with iridescent, somewhat oblong patches in humeral portions and postero-lateral portions, and with small cyanetic part just after scutellum on each elytron; fore body moderately

shining and elytra more strongly so, under surface bearing dark cyanetic tinge and moderately shining. Oblong; strongly convex above.

Head somewhat transverse-hexagonal, weakly convex and moderately closely, finely punctate, punctures small but often intermixed with larger ones; fronto-clypeal suture straight, with both ends hardly reaching ocular sulci; clypeus transverse, nearly straightly truncate in front with both ends feebly produced; genae rather oblique triangular with gena-clypeal border indistinct; eyes very large, roundly produced laterally, distance between them a little shorter than their transverse diameter; antennae reaching base of pronotum, 6 apical segments flattened and club-like, 10th widest, 11th oval, relative length of each segment from basal to apical: 2.6, 0.6, 1.3, 0.8, 0.7, 1.2, 1.2, 1.3, 1.4, 1.6, 2.4.

Pronotum a little less than twice as broad as long, broadest at base, gradually narrowed to front; front border feebly arcuate posteriad, finely margined but the margin is interrupted in median $1/5$; basal border bisinuate, shortly truncate opposite to scutellum; lateral margins rather distinctly sulcate; front angles obtuse and with rounded corners; hind angles subrectangular; disk moderately convex, moderately closely, finely punctate, punctures a little larger and sparser than on head, with short oblique impressions at base on both sides. Scutellum triangular with rounded sides.

Elytra 2.1 times as long as broad, 3.7 times the length and 1.8 times the breadth of pronotum, broadest at middle, roundly narrowed fore- and backward, weakly roundly produced in apical portion; dorsum strongly convex above, thickest at basal $2/5$; disk with rows of punctures, often striated, distance between them inconstant and approximately 1.5–2.5 times their diameter; scutellar striae very short; intervals nearly flat in middle, feebly convex laterally, rather sparsely scattered with microscopic punctures; sides steeply declined with lateral margins distinctly sulcate.

Mentum subquadrate and coriaceous, raised antero-medially, weakly V-shaped in front; gula nearly triangular, strongly impressed along borders; terminal segment of maxillary palpus strongly dilated, with arcuate outer side twice the length of inner one and nearly the same length of apical.

Prosternum short, coriaceous, margined in front and pointed medially, intercoxal space rather noticeably, fusiformly raised and rimmed, with prosternal process acute; mesosternum deeply depressed, with short Y-shaped elevation on hind border and coriaceous; metasternum broad, finely punctate and shallowly wrinkled, with median impression in posterior $3/5$. Abdomen rather closely, finely punctate, somewhat longitudinally wrinkled in 3 anterior sternites and also in basal half of 4th.

Legs medium-sized; each tibia moderately widened to apex, relative length of each segment of tarsi: 2.6, 1.5, 1.4, 1.0, 4.0; 3.0, 2.0, 2.0, 1.2, 4.1; 4.2, 2.0, 1.6, 4.5, respectively.

Body length: 6.0–9.5 mm.

Holotype: ♂, Benakat (nursery site), South Sumatra, Indonesia, 5. III. 1983, H. MAKIHARA leg. Paratypes: 1 ex., nursery site, 25. II.; 1 ex., ditto, 5. III.; 1 ex.,

ditto, 7. III.; 2 exs., ditto, 10. III.; 1 ex., ditto, 11. III.; 1 ex., ditto, 13. III.; 1 ex., ditto, 15. III. 1983, H. MAKIHARA leg.

This new species has noticeable 4 patches on elytra. I have some specimens allied to this new one from Malaysia, though some differences are observed probably due to local variation.

Hemicera tabatai sp. nov.

Dark blackish brown, bearing dark greenish bronzy tinge on upper surface, with mouth-parts and basal half of each antenna lighter in color, femora and tibiae having dark cyanetic luster; strongly metallicly shining above. Oblong oval; strongly convex above.

Head transverse, moderately convex, finely punctate; frons rather steeply declined to nearly straight, finely but clearly impressed fronto-clypeal suture, both ends of which are connected with ocular sulci; clypeus short, somewhat transversely crescent-shaped, very feebly bisinuate in front; genae small and oblique-triangular; eyes large and oblique, roundly produced laterally, distance between them about $3/5$ times the length of their transverse diameter; antennae reaching basal $2/5$ of pronotum, 6 apical segments rather strongly flattened and widened, 10th widest and 11th ovoid, relative length of each segment from basal to apical: 2.1, 0.5, 0.8, 0.6, 0.5, 0.9, 1.0, 1.3, 1.2, 1.4, 1.8.

Pronotum 1.8 times as broad as long, broadest at base, gradually and roundly narrowed to front; front border nearly straight, rather distinctly margined, basal border bisinuate and very slightly bisinuate again in each situation, shortly truncate opposite to scutellum; lateral margins rather strongly sulcate and weakly reflexed; front angles obtuse with rounded corners; hind angles subrectangular; disk moderately strongly convex, finely punctate, faintly depressed near base on both sides. Scutellum subcordate, smooth but sparsely scattered with microscopic punctures.

Elytra 1.6 times as long as broad, about twice the length and 1.3 times the breadth of pronotum, broadest at apical $1/3$, weakly narrowed to front and roundly narrowed to rear, slightly, roundly produced apically; dorsum strongly convex above, thickest at middle, with surface very weakly microsculptured; disk with rows of small punctures, which are often striated and intermixed with smaller ones and distance between them about 3-5 times their diameter, with 5th row strongly impressed in basal portion; intervals nearly flat, scattered with microscopic punctures which are approximately $1/4$ of larger ones (in rows) in size; sides rather abruptly declined and lateral margins rather distinctly sulcate.

Mentum trapezoidal and feebly coriaceous, raised antero-medially; gula parabolic, finely impressed along borders on both sides; terminal segment of maxillary palpus with arcuate outer side about 1.7 times the length of inner or apical.

Prosternum fairly short, finely margined in front, very feebly microreticulate, with intercoxal space fusiformly raised, flattened on surface and rimmed along margin,

rather acute at posterior apex (=prosternal process); mesosternum also short, strongly depressed anteriorly, raised somewhat in X-shape posteriorly; metasternum relatively broad, very feebly microreticulate, sparsely scattered with minute punctures, shallowly, obliquely wrinkled antero-laterally, with median impression in posterior 2/3. Abdomen microscopically punctate, very feebly microreticulate in 3 anterior sternites and basal half of 4th, weakly wrinkled in 2 anterior sternites and basal portion of 3rd.

Legs medium-sized, apical half of each tibia rather remarkably haired on inner side, relative length of each tarsal segment of pro-, meso- and metatarsi: 0.9, 0.6, 0.6, 0.5, 1.6; 1.4, 0.7, 0.7, 0.5, 1.8; 2.2, 1.1, 1.0, 2.0.

Body length: 6.2–7.9 mm.

Holotype: ♂, Benakat (natural forest), South Sumatra, Indonesia, 19. III. 1983, H. MAKIHARA leg. Paratypes: 1 ex., nursery site, 10. II.; 2 exs., natural forest, 18. III.; 2 exs., ditto, 19. III.; 2 exs., ditto, 21. III. 1983, H. MAKIHARA leg.

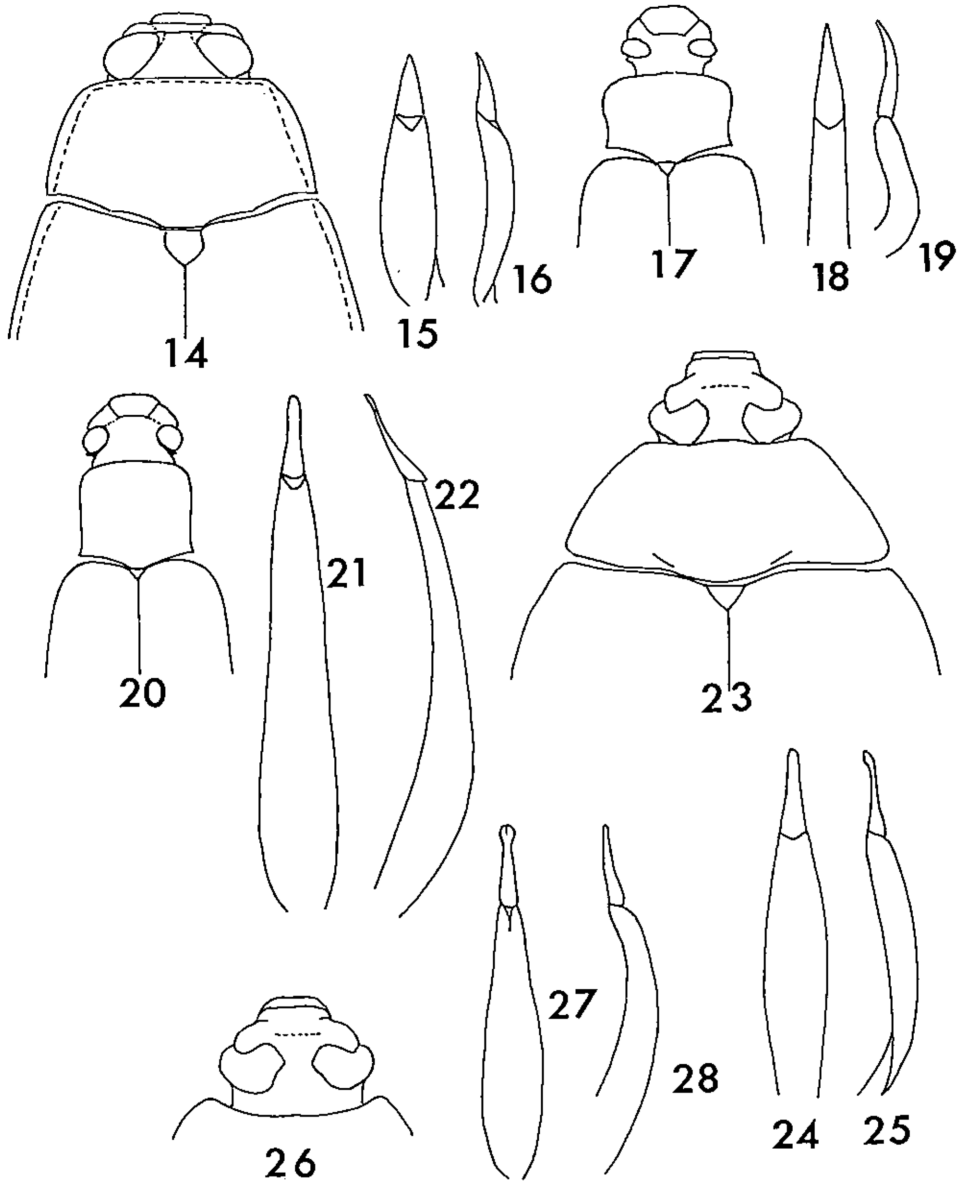
This new species is allied to *Hemicera tsuyukii* MASUMOTO from Formosa, but is distinguishable from the latter by its body being more elongate and more finely punctate above, and punctures in rows on elytra distinctly finer.

Simalura yamatei sp. nov.

Dark reddish brown to blackish brown, with head and pronotum tinged with bluish to purplish color and shining, elytra reddish coppery to greenish brassy and strongly metallicly shining, under surface moderately shining. Elongate oval; convex and widened posteriad.

Head transverse-elliptic, moderately convex above, weakly depressed in middle, rather closely and strongly punctate, punctures smaller to apex; fronto-clypeal border nearly straight and impressed, impression obliquely reaching outer margin; clypeus wide, nearly straight and weakly bent downward in front, without membranous area; genae nearly horizontal, with outer margins weakly, obliquely produced; eyes fairly large, convex laterad, distance between them about 1.9 times their transverse diameter; tempora a little narrower than breadth between genae, slightly pointed just behind each eye; antennae medium-sized, reaching basal 1/4 of pronotum, 6 apical segments flattened and noticeably widened, 6th triangular, 7th to 10th nearly trapezoidal, 11th oval, relative length of each segment from basal to apical: 4.0, 1.6, 2.4, 1.8, 2.0, 2.5, 2.7, 2.5, 2.7, 2.6, 4.2.

Pronotum subrectangular, about 1.5 times as broad as long, broadest at anterior 1/3, roundly narrowed to front and gradually narrowed to rear, weakly sinuate before base; front border weakly arcuate forward, finely margined; basal border more strongly arcuate posteriad; sides moderately declined to sulcate lateral margins; front angles rounded; hind angles subrectangular; disk strongly convex anteriorly, moderately closely, finely punctate, with spot-like faint impressions at anterior 1/3 on both sides, transversely depressed in basal 2/7. Scutellum small, triangular with slightly rounded sides, scattered with small (sometimes intermixed with larger) punctures.



Figs. 14–28.—14, *Hemicera tabatai* sp. nov., fore body; 15, ditto, male genitalia (dorsal view); 16, ditto, male genitalia (lateral view); 17, *Simalura yamatei* sp. nov., fore body; 18, ditto, male genitalia (dorsal view); 19, ditto, male genitalia (lateral view); 20, *Thesilea ariharai* sp. nov., fore body; 21, ditto, male genitalia (dorsal view); 22, ditto, male genitalia (lateral view); 23, *Amarygmus katoii* sp. nov., fore body; 24, ditto, male genitalia (dorsal view); 25, ditto, male genitalia (lateral view); 26, *Elixota ohtai* sp. nov., fore body; 27, ditto, male genitalia (dorsal view); 28, ditto, male genitalia (lateral view).

Elytra about 1.6 times as broad as long, 4 times the length and 1.6 times the breadth of pronotum, broadest at apical 2/5, feebly narrowed to front, roundly narrowed to rear, very narrowly, roundly produced at apex; dorsum strongly convex above, thickest at basal 2/5; disk punctate-striate, striae fine, punctures in them about 1–3 times their diameter apart; intervals feebly microsculptured, microscopically punctate; epipleura rimmed along inner margin opposite to meso- and metasterna.

Mentum trapezoid, raised antero-medially, obliquely gouged behind middle on both sides; gula large and parabolic, finely impressed along borders; terminal segment of maxillary palpus with arcuate outer side about twice the length of inner, 0.8 times the length of straight apical.

Prosternum medium-sized, coriaceous anteriorly, raised and rather smooth between coxae, with prosternal process triangular and pointed; mesosternum a little short, depressed anteriorly, elevated in Y-shape in posterior portion; metasternum medium-sized, rather smooth, feebly microreticulate and shallowly wrinkled laterally, scattered with microscopic punctures, each one of which has a minute bristle. Abdomen rather closely punctate, punctures finer to apex, a little rugose in each basal portion of 3 anterior sternites.

Legs without any particular characteristics, relative length of each tarsal segment from basal to apical: 2.0, 1.7, 1.5, 1.1. 6.0; 2.5, 1.6, 1.5, 1.3, 6.1; 4.6, 2.4, 1.7, 5.8.

Body length: 5.6–7.3 mm.

Holotype: ♂, Benakat (nursery site), South Sumatra, Indonesia, 18. III. 1983, H. MAKIHARA leg. Paratypes: 1 ex., ditto, 3. III.; 1 ex., ditto, 4. III.; 1 ex., ditto, 5. III.; 1 ex., ditto, 10. III.; 1 ex., ditto, 11. III.; 1 ex., ditto, 13. III.; 2 exs., ditto, 15. III. 1983, H. MAKIHARA leg.

This new species may belong to KULZER's 1st group of the genus *Simalura*, but the present one has no special characteristics along the inner margin of each protibia in male.

Thesilea ariharai sp. nov.

Blackish brown, with head, pronotum, scutellum and upper side of each leg except tarsus indigo-bluish, elytra purplish, and underside dark bluish; strongly metallicly shining. Elongate; strongly convex longitudinally.

Head rather transverse-octagonal, strongly raised posteriorly, moderately closely punctate, punctures finer to apex; frons a little sparsely punctate, steeply declined to clearly impressed fronto-clypeal border, impression reaching outer margin; clypeus short, feebly convex transversely, truncate in front; genae oblique, raised along outer margins and depressed along fronto-genal border; eyes medium-sized, roundly convex laterad, distance between them about 2.6 times their diameter, with ocular sulci deep; tempora feebly pointed postero-laterad just behind eyes; antennae medium-sized, reaching basal 1/3 of pronotum, 6 apical segments flattened and club-like, 11th ovoid and largest, relative length of each segment from basal to apical: 3.2, 1.7, 2.6, 2.3, 2.2,

2.3, 2.2, 2.5, 2.3, 2.5, 4.1.

Pronotum subquadrate, 1.2 times as broad as long, broadest at anterior $2/5$; front border moderately arcuate, not margined; basal border weakly arcuate posteriorly and entirely margined; sides gradually declined and lateral margins finely margined, sinuate in basal $2/5$; front angles narrowly rounded; hind angles subrectangular; disk rather strongly convex, especially distinct anteriorly, rather closely, finely punctate, each puncture with a very short, microscopic bristle. Scutellum small, triangular, slightly depressed and smooth.

Elytra 1.8 times as long as broad, 3.5 times the length and 1.6 times the breadth of pronotum, broadest at apical $2/7$, weakly narrowed to front, roundly so to rear, feebly, roundly produced in apical portion; dorsum rather strongly convex, thickest at basal $2/5$, weakly but rather noticeably depressed behind scutellum; disk with rows of punctures, which are often striated, distance between them about 0.8–2.0 times their diameter; intervals nearly flat in inner portion, feebly convex laterally, weakly microreticulate, scattered with fine punctures, each with a very minute bristle (visible under $\times 20$); sides rather steeply declined but sulcated lateral margins are visible from above.

Mentum subcordate, coriaceous, raised antero-medially, upper side straight, basal margin feebly rimmed; gula parabolic, impressed along borders; terminal segment of maxillary palpus with arcuate outer side about 1.8 times the length of inner, nearly of the same length as apical.

Prosternum coarsely, closely punctate, finely margined in front, strongly raised between coxae, with prosternal process subcordate and depressed, blunt at apex; mesosternum depressed and coarsely punctate in anterior half, raised and roughly coriaceous in Y-shape in posterior half, with low prominence at middle; metasternum rather broad, feebly microreticulate, sparsely, finely punctate (each puncture with microscopic bristle), convex in middle, with median impression in posterior $3/5$, rather noticeably raised in area between coxae. Abdomen fairly closely, finely punctate, punctures finer to apex, weakly wrinkled in basal half.

Legs without special characteristics, relative length of each tarsal segment from basal to apical: 2.9, 1.8, 1.9, 2.0, 5.9; 2.6, 2.2, 2.1, 2.1, 6.1; 6.0, 3.2, 3.0, 6.1, respectively.

Body length: 8.3–10.5 mm.

Holotype: ♂, Benakat (nursery site), South Sumatra, Indonesia, 22. II. 1983, H. MAKIHARA leg. Paratypes: 1 ex., plantation site, 9. II.; 1 ex., nursery site, 22. II.; 1 ex., ditto, 25. II.; 1 ex., ditto, 27. II.; 1 ex., ditto, 12. III.; 1 ex., ditto (from *Albizia falcata*), 14. III.; 1 ex., ditto, 19. III. 1983, H. MAKIHARA leg.

This new species somewhat resembles *Gauromaia* species, but is easily distinguishable from them by having narrower head and pronotum with the front border not margined.

Amarygmus katoi sp. nov.

This new species is allied to *Amarygmus aeneus* WIEDEMANN, first described from

Java and also found in Sumatra, but is discriminated from the latter by the following characteristics:

Body larger and more convex laterad. Head and pronotum bearing bluish green and elytra brassy green metallic luster.

Head more weakly and sparsely punctate; frons shorter, with fronto-clypeal border impressed and shortly arcuate; clypeus nearly vertical; antennae a little shorter and thicker, relative length of each segment from basal to apical: 1.3, 0.5, 1.3, 1.1, 1.1, 0.9, 0.9, 0.8, 0.8, 0.9, 1.2.

Pronotum more transverse, about twice as broad as long; front border arcuate posteriad, nearly straight in median half.

Elytra a little less than 1.4 times as long as broad, 4 times the length and 1.4 times the breadth of pronotum, broadest at middle and thickest a little before middle; disk punctate-striate, punctures in striae more closely set to each other and 1–2 times their diameter apart; intervals nearly flat, scattered with minute punctures.

Mentum subcordate, raised antero-medially, shortly truncate at hind apex; gula triangular, depressed postero-medially, impressed along borders; terminal segment of maxillary palpus with arcuate side about 1.4 times the length of inner, nearly of the same length as apical.

Prosternum short and coriaceous, margined in front, rather widely raised between coxae and depressed medially, with prosternal process subcordate and rather conspicuous; mesosternum short, strongly depressed in front, hollowed V-shaped in middle, elevated posteriorly; metasternum medium-sized, feebly coriaceous, with median impression in posterior 2/3. Abdomen rather closely punctate, punctures closer and finer to apex, wrinkled in 3 anterior sternites, 1st sternite with crenulate impression along basal border on each side.

Legs comparatively short, relative length of each tarsal segment from basal to apical: 0.7, 0.4, 0.3, 0.3, 1.2; 0.9, 0.5, 0.4, 0.4, 1.4; 2.3, 0.7, 0.5, 1.4, respectively.

Male genitalia slender in basal portion, slightly hooked at apex.

Body length: 8.8–9.6 mm.

Holotype: ♂, Benakat (nursery site), South Sumatra, Indonesia, 23. II. 1983, H. MAKIHARA leg. Paratypes: 9 exs., same data as the holotype.

The holotype specimen was captured on the bark of *Ablizia falcata*.

Elixota ohtai sp. nov.

This new species resembles *Amarygmus sakaii* MASUMOTO from Formosa but is discriminated from the latter by the following characteristics:

Reddish brown to blackish brown with upper surface bearing greenish brassy metallic luster. Oblong oval; strongly convex above.

Head comparatively narrow; eyes invading more deeply into frons, distance between them about a half their diameter; frons depressed anteriorly; genae smaller but more strongly raised along outer margins and narrowly produced; antennae slightly

slender, relative length of each segment from basal to apical: 3.9, 1.6, 3.7, 2.9, 3.0, 3.0, 3.0, 3.0, 2.9, 2.7, 3.2.

Pronotum 1.9 times as broad as long, broadest at base, minutely, unevenly punctate; disk often with a pair of spot-like weak impressions near front border, also with short, oblique, sublinear ones at base, and small semicircular one just opposite to scutellum in some individuals.

Elytra 3.8 times as long as broad, about twice the length and 1.3 times the breadth of pronotum, broadest at basal 1/3 and thickest at a little before the broadest part; disk with rows of elongate punctures, which are all finer than in *A. sakaii*, often striated in inner portion; intervals weakly microreticulate, scattered with fine punctures.

Mentum subcordate, raised medially, with lateral margins rimmed; gula triangular, rugose posteriorly, impressed along borders; terminal segment of maxillary palpus large and strongly dilated, with arcuate outer side about 1.6 times the length of rounded inner one, 0.8 times the length of apical.

Prosternum short, rimmed in front, strongly raised between coxae, lightly depressed medially, with prosternal process ligulately protruding in upper part, triangularly so at base; mesosternum also short, strongly depressed in anterior half, deeply hollowed in V-shape in middle, elevated and rugose posteriorly, impressed at base medially; metasternum medium-sized, rather smooth, finely punctate, shallowly wrinkled antero-medially, with median impression in posterior 4/5. Abdomen finely punctate, punctures finer to apex, very shallowly wrinkled in 3 anterior sternites.

Legs comparatively short and stout, with inner margin of mesotibia feebly indented in apical 2/3, relative length of each tarsal segment as follows: 4.0, 2.9, 2.2, 2.0, 7.2; 5.4, 3.5, 3.0, 2.5, 8.0; 14.0, 4.2, 3.4, 8.1, respectively.

Male genitalia slender, with small spatulate apex.

Body length: ca. 9.5 mm.

Holotype: ♂, Benakat (nursery site), South Sumatra, Indonesia, 23. II. 1983, H. MAKIHARA leg. Paratypes: 1 ex., plantation site, 23. II.; 1 ex., nursery site (from *Albizia falcata*), 7. III.; 1 ex., ditto, 12. III. 1983, H. MAKIHARA leg.

The holotype specimen was captured on the bark of *Albizia falcata*.

List of Tenebrionidae from Benakat, South Sumatra

Tribe Heterotarsini

1. *Heterotarsus inflatus* LACORDAIRE, 1859

Specimens examined: 8 exs., nursery site and plantation site.

Tribe Opatrini

2. *Gonocephalum adpressiforme* KASZAB, 1951

Specimens examined: 2 exs., nursery site.

Tribe Bolitophagini

3. *Falsonannocerus makiharai* sp. nov.

4. *Chaetopsia sumatrensis* sp. nov.
5. *Bradymerus clathratus* SCHAUFUSS, 1887
Specimens examined: 3 exs., nursery site (light trap).
6. *Atasthalus callosus* GEBIEN, 1914
Specimen examined: 1 ex., nursery site.

Tribe Diaperini

7. *Platydemia detersum* (WALKER, 1858)
Specimen examined: 1 ex., nursery site.
8. *Ischnodactylus* sp.
Specimen examined: 1 ex., nursery site.
Though *I. gradatus* GEBIEN is known from Sumatra, this species rather resembles *I. luzonus* GEBIEN. The specimen is a female.
9. *Ceropria induta* (WIEDEMANN, 1819)
Specimens examined: 2 exs., nursery site (light trap).

Tribe Leiochrini

10. *Leiochrinus rufofulvus* WESTWOOD, 1883
Specimen examined: 1 ex., plantation site.
11. *Leiochrodes rufofulvus* WESTWOOD, 1883
Specimens examined: 6 exs., nursery site (from *Ficus* sp.).
12. *Leiochrodes harpagon* KASZAB, 1961
Specimen examined: 1 ex., nursery site (from *Ficus* sp.).

Tribe Ulomini

13. *Cneocnemis sumatrensis* sp. nov.
14. *Cneocnemis haemorrhoea* (FAIRMAIRE, 1893)
Specimen examined: 1 ex., nursery site (light trap).
15. *Uloma javana* GEBIEN, 1912
Specimens examined: 2 exs., nursery site.
16. *Uloma contracta* FAIRMAIRE, 1882
Specimen examined: 1 ex., nursery site (light trap).
17. *Uloma* sp.
Specimens examined: 2 exs., nursery site.
Resembles *U. rufilabris* FAIRMAIRE, 1882.
18. *Eutochia lateralis* (BOHEMAN, 1858)
Specimens examined: 2 exs., nursery site.

Tribe Tenebrionini

19. *Encyalesthus aeruginosus* (FABRICIUS, 1787)
Specimens examined: 2 exs., nursery site (on the bark of *Albiza falcata*).
20. *Encyalesthus* sp.
Specimen examined: 1 ex. (♀), natural forest.
Resembles *E. exularis* GEBIEN, 1913.

21. *Cryphaeus gazella* (FABRICIUS, 1798)
Specimens examined: 2 exs. (♂♀), nursery site.

Tribe Lupropini

22. *Luprops tebingensis* KASZAB, 1939
Specimens examined: 3 exs., nursery site.
23. *Luprops* sp.
Specimens examined: 10 exs., nursery site.
24. *Xanthalia* sp.
Specimen examined: 1 ex., nursery site.

Tribe Cnodalonini

25. *Tetraphyllus corruscus* FAIRMAIRE, 1882
Specimen examined: 1 ex., nursery site.
26. *Tetraphyllus politus* KASZAB, 1944
Specimen examined: 1 ex., nursery site.
27. *Tetraphyllus marginicollis* FAIRMAIRE, 1893
Specimens examined: 2 exs., nursery site (light trap).
28. *Tetraphyllus cyaneicollis* FAIRMAIRE, 1893
Specimen examined: 1 ex., nursery site.
29. *Artactes nigratarsis* PASCOE, 1868
Specimens examined: 2 exs., plantation site and nursery site (from *Albizia falcata*).
30. *Hemicera splendens* (WIEDEMANN, 1823)
Specimens examined: 31 exs., nursery site, same (from *Albizia falcata*), plantation site and natural forest.
31. *Hemicera* sp.
Specimen examined: 1 ex., natural forest.
Resembles *H. splendens*.
32. *Hemicera* sp.
Specimen examined: 1 ex., nursery site.
Resembles *H. splendens*.
33. *Hemicera femoralis* PIC, 1921
Specimens examined: 5 exs., nursery site and same (from *Albizia falcata*).
34. *Hemicera* sp.
Specimen examined: 1 ex., nursery site.
Resembles *H. fukiensis* KASZAB, 1954.
35. *Hemicera multicolor* FAIRMAIRE, 1893
Specimens examined: 5 exs., nursery site (on the bark of *Albizia falcata*).
36. *Hemicera compacta* FAIRMAIRE, 1882
Specimens examined: 8 exs., nursery site.
37. *Hemicera empatanda* sp. nov.
38. *Hemicera tabatai* sp. nov.
39. *Hemicera* sp.

Specimens examined: 2 exs., nursery site.

Resembles *A. brendelli* KASZAB, 1980.

76. *Amarygmus* sp.

Specimen examined: 1 ex., nursery site.

Resembles *A. lucens* KASZAB, 1980.

77. *Amarygmus* sp.

Specimens examined: 3 exs., nursery site.

Resembles *A. sericeus* GEBIEN, 1927.

78. *Amarygmus* sp.

Specimen examined: 1 ex., nursery site.

Belongs to "*Pseudamarygmus*" (sensu PIC).

Tribe Strongyliini

79. *Strongylium subimpressum* FAIRMAIRE, 1903

Specimen examined: 1 ex., nursery site.

80. *Strongylium* sp.

Specimen examined: 1 ex., nursery site.

Resembles *S. varians* PASCOE, 1883.

81. *Strongylium* sp.

Specimen examined: 1 ex., nursery site.

Resembles *S. binhense* PIC, 1922.

摘 要

槇原 寛氏が、南スマトラのブナカで、1983年に採集されたゴミムシダマシ類の新種9種を記載し、採集された全種をリストにした。

The Buprestid Beetles of the Subfamily Agrilinae from Japan (Coleoptera, Buprestidae)

Masao TÔYAMA

4-16, Koshien 6, Nishinomiya, Hyogo 663, Japan

Abstract A new species of the genus *Toxoscelus*, and fifteen new species and four subspecies of the genus *Agrilus* are described from Japan, and a species of the genus *Agrilus* is newly recorded. A new species of the genus *Agrilus* from Taiwan is also described.

The buprestid beetles belonging to the subfamily Agrilinae occurring in Japan have been studied by some previous authors. Although a number of species of this subfamily have already been recorded and described from this country, there are still many others that await descriptions.

Recently, I had opportunities to examine many Japanese species belonging to this subfamily. After a careful examination, it becomes apparent that more than fifty species must be newly described or recorded from Japan.

In this paper, seventeen new species and four new subspecies will be described, and a species will be newly recorded from Japan. All the holotypes designated in this paper are deposited in the National Science Museum (Nat. Hist.), Tokyo.

Before going further, I wish to express my sincere gratitude to Dr. Yoshihiko KUROSAWA of the National Science Museum (Nat. Hist.), Tokyo, for his constant guidance, and to Dr. Shun-Ichi UÉNO of the same museum for his critical reading of the original manuscript. I am also indebted to Drs. Sadahiro OHMOMO and Keisuke TSUJI, and Mrssrs. Kôyô AKIYAMA, Kanoh DEGUCHI, Ken-Ichi EMOTO, Hiroshi FUJITA, Takeichiro HATAYAMA, Shoichi IMASAKA, Nobuyuki KOBAYASHI, Isao MATOBA, Akira NISHIYAMA, Koichi SUGINO, Yoshimasa SHIOZAKI, Minoru TAO, Ryoji TOYOSHIMA and Masamichi YAGI for their kind offers of the materials.

Toxoscelus matobai sp. nov.

(Fig. 18)

Body small, rather robust, somewhat deplanate above; above black with aeneous tinge; beneath black with slight violaceous tinge; antennae and legs concolorous with body beneath.

Head small, with the median groove deep and running from vertex to the centre of frons; vertex feebly gibbose on each side of median groove, longitudinally rugoso-

punctate; frons slightly convex, transversely rugoso-punctate; eyes distinctly converging below in frontal aspect, with the inferior rims arcuately emarginate; clypeal suture inconspicuous; clypeus strongly narrowed by antennal cavities, with the anterior margin arcuately emarginate; antennal cavities large, with the posterior margins strongly carinate; antennae short and compact, eleven-segmented, serrate from the fifth segment, with the first segment stout, subglobular, about 1.5 times as long as the second, which is equally stout and subglobular to the first, the third and fourth about equal in length and shape.

Pronotum transverse, about 1.4 times as wide as long, widest just before the middle; sides arcuately expanded in dorsal aspect, slightly but distinctly bisinuate in lateral aspect, very finely and inconspicuously crenulate; anterior margin bisinuate, with the median lobe broadly and arcuately produced; posterior margin strongly and angulately emarginate just before the elytral lobes, slightly and arcuately emarginate just before scutellum; anterior angles acute and produced in dorsal aspect, abased at the tips in lateral aspect; posterior angles obtuse and rounded; marginal carinae entire; disc uneven, with a small transverse depression behind the anterior lobe, another small shallow one just before scutellum, large and transverse lateral ones behind the middle; surface rugoso-punctate. Scutellum subtriangular, very finely rugose, with the anterior margin arcuately but slightly produced.

Elytra broader than pronotum, about 2.2 times as long as wide, about 3.7 times as long as pronotum, widest just behind the middle; sides rounded at humeri, slightly expanded behind them, slightly convergent to anterior third, expanded and swollen near the middle, then obliquely convergent to the tips, which are separately and narrowly rounded; basal margins sinuate, with the lobes subtriangularly produced; sutural margin slightly elevated in posterior two-thirds; lateral margins unarmed; disc convex, rather profoundly depressed along the basal margins, longitudinally deplanate along the suture in anterior half; surface evenly but inconspicuously imbricato-punctate, clothed with fine, recumbent, blackish hairs, ornamented with semirecumbent cinereous hairs arranged on each elytron as follows: a round marking just behind the basal depression; a round marking along the suture at the anterior fourth; a zigzag band just behind the middle; a wavy band at the apical fourth.

Prosternum transversely depressed along the anterior margin, which is bilobed; prosternal process flattened, gradually narrowed to just behind anterior coxal cavities, then strongly attenuate to the pointed tip. Abdomen beneath with anal segment broadly rounded at the tip. Legs short and robust; anterior tibiae curved; middle tibiae strongly curved; posterior tibiae rather straight, with the inferior ridge sinuate.

Length: 4.8–5.7 mm; width: 1.3–2.0 mm.

Holotype: ♂, Mt. Gomadan, Wakayama Pref., 27. VII. 1982, I. MATOBA lgt.
Allotype: ♀, Mt. Kenashi, Okayama Pref., 9. VII. 1983, O. YAMAJI lgt.

Remarks: This new species is allied to *T. yakushimensis* Y. KUROSAWA, 1957, but can be easily distinguished from it by the following characteristics: 1) body rather slender, instead of being robust; 2) transverse bands on elytra slightly waved, while

in *T. yakushimensis*, they are strongly waved.

Agrilus hirashimai Y. KUROSAWA, 1964

Agrilus hirashimai Y. KUROSAWA, 1964, Kontyû, Tokyo, 32: 329-331.

Agrilus hirashimai: Y. KUROSAWA, 1974, Coleopt. News, (21/22): 2.

Specimen examined: 1 ♂, Ie, Okinawa Is., 15. V. 1981, R. TOYOSHIMA lgt. (New to Okinawa Is.)

Host plant: *Castanopsis* sp. (confirmed by R. TOYOSHIMA).

Distribution: Amami-Oshima Is., Okinawa Is.

Agrilus hirashimai yaeyamaensis subsp. nov.

(Fig. 19)

Differs from the nominotypical race in the following points: 1) Body above black with aeneous tinge, while in ssp. *hirashimai*, it is entirely black without aeneous tinge; 2) elytra evenly covered with cinereous hairs, while in ssp. *hirashimai*, they are clothed with cinereous hairs only in posterior half.

Holotype: ♂, Mt. Omotodake, Ishigaki Is., 14. IV. 1973, H. IRIE lgt. Allotype: ♀, Mt. Omotodake, Ishigaki Is., 17. IV. 1973, H. IRIE lgt. Paratypes: 1 ♂, Mt. Bannadake, Ishigaki Is., 21. IV. 1965, H. YOKOYAMA lgt.; 1 ♂, Mt. Omotodake, Ishigaki Is., 10. IV. 1974, M. FUKAMACHI lgt.; 1 ♀, Mt. Bannadake, Ishigaki Is., 12. IV. 1976, N. NISHIKAWA lgt.

Distribution: Ishigakijima Is.

Agrilus mendax sachalinensis OBENBERGER, 1935

Agrilus sachalinensis OBENBERGER, 1935, Čas. Čs. Spol. ent., 32: 165.

Agrilus mendax sachalinensis: Y. KUROSAWA, 1974, Coleopt. News, (23/24): 3.

Specimen examined: 1 ♀, Rurua River, Shiretoko, Hokkaido, 18-19. VII. 1965, T. NAKAMURA lgt. (New to the fauna of Japan.)

Agrilus suginoi sp. nov.

(Figs. 1, 20)

Body subcylindrical; above entirely dark blue; beneath blackish blue, less shining than above; antennae and legs concolorous with body beneath.

Head arcuately produced in dorsal aspect; vertex longitudinally and very obsoletely impressed at the middle, longitudinally rugoso-punctate; frons convex, transversely rugoso-punctate, clothed with semirecumbent, short, cinereous hairs, without median groove; eyes large, subparallel in frontal aspect, with the inferior rims distinctly sinuate; clypeal suture transverse, almost straight; clypeus slightly broader than long

between antennal cavities, with the anterior margin arcuately emarginate; antennal cavities large, with the posterior margins carinate, and small and transverse pores just above the cavities; antennae rather compact, eleven-segmented, serrate from the fourth segment, with the first segment stout, about 1.3 times as long as the second, which is stout and subglobular, the third shorter than the second, the fourth subtriangular, slightly shorter than the third.

Pronotum transverse, about 1.4 times as wide as long, widest behind anterior angles; sides slightly sinuate, roundly expanded behind anterior angles, then sinuously convergent to posterior angles; anterior margin bisinuate, with the median lobe arcuately produced; posterior margin trisinuate, with the median lobe obsoletely emarginate before scutellum; anterior angles acute and produced in dorsal aspect, acute and abased in lateral aspect; posterior angles subrectangular in dorsal aspect; prehumeral carinae arcuate, extending to posterior half, not conjoined with marginal carinae; marginal carinae sinuate, sharply defined; submarginal carinae subparallel to marginal ones in anterior fourth, then gradually approximate to the latter, and conjoined with them just before posterior angles; disc convex, with a small and shallow median depression just before scutellum, and lateral depressions along prehumeral carinae; surface transversely rugoso-punctate. Scutellum with a transverse carina, the area before the carina distinctly declivous in front, median projection sharply produced posteriorly.

Elytra about 2.7 times as long as wide, about 3.7 times as long as pronotum, and widest at the posterior two-fifths; sides obtuse at humeri, slightly sinuate from the base to behind the middle, where they are arcuately rounded, then convergent to the tips, which are separately rounded and very finely denticulate; basal margins carinate, with the lobes arcuately produced at the middle; sutural margin slightly elevated in posterior seven-tenths; lateral margins unarmed except for the part near apices, where they are very finely denticulate; humeri not prominent, without humeral carinae; disc longitudinally depressed just behind scutellum for a short distance, broadly depressed behind the elytral lobes; surface obsoletely rugoso-punctate, covered with semirecumbent, inconspicuous, short, dark hairs.

Body beneath evenly clothed with fine cinereous hairs. Prosternum convex; gular lobe with the anterior margin very obsoletely emarginate at the middle; prosternal process subparallel between anterior coxal cavities, then attenuate to the apex. Abdomen beneath with the last ventral segment rounded at the apex. Pygidium without median carina, and rounded at the apex. Posterior tarsi distinctly shorter than posterior tibiae; the first segment slightly shorter than the following three united. Claws simply cleft.

Length: 4.8–6.5 mm; width: 1.0–1.2 mm.

Holotype: ♀, Kanpira, Iriomote Is., 10. V. 1973 (host out), K. SUGINO lgt. Paratype: 1 ♀, same data as holotype.

Remarks: This new species is closely allied to *A. rotundicollis* E. SAUNDERS, 1873, from Siberia, N. China, Korea and Japan, but can be distinguished from it by the following characteristics: 1) frons narrower; 2) eyes subparallel in frontal aspect, while

in *A. rotundicollis*, they are distinctly convergent below; 3) pronotum slenderer.

Agrilus imasakai sp. nov.

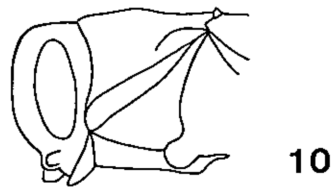
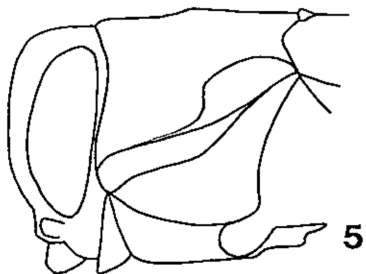
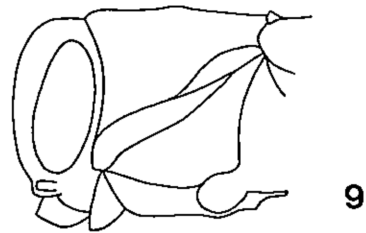
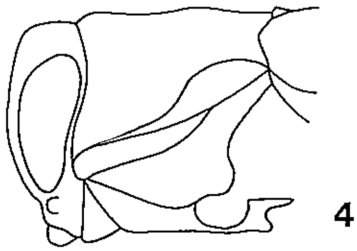
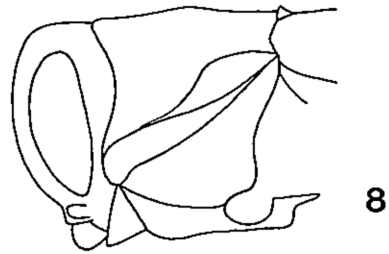
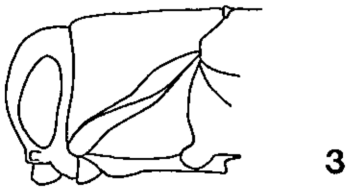
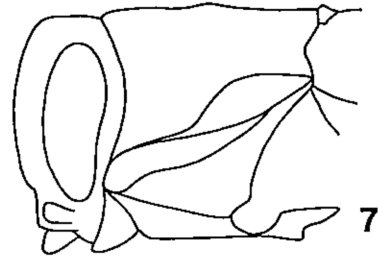
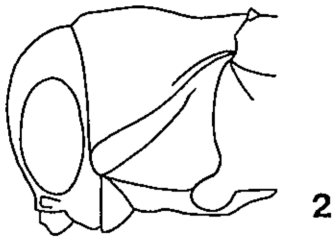
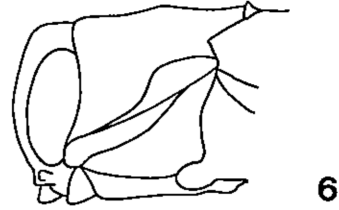
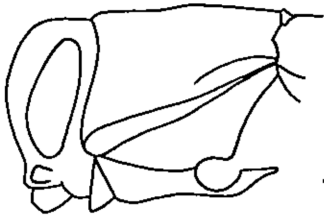
(Figs. 2, 21)

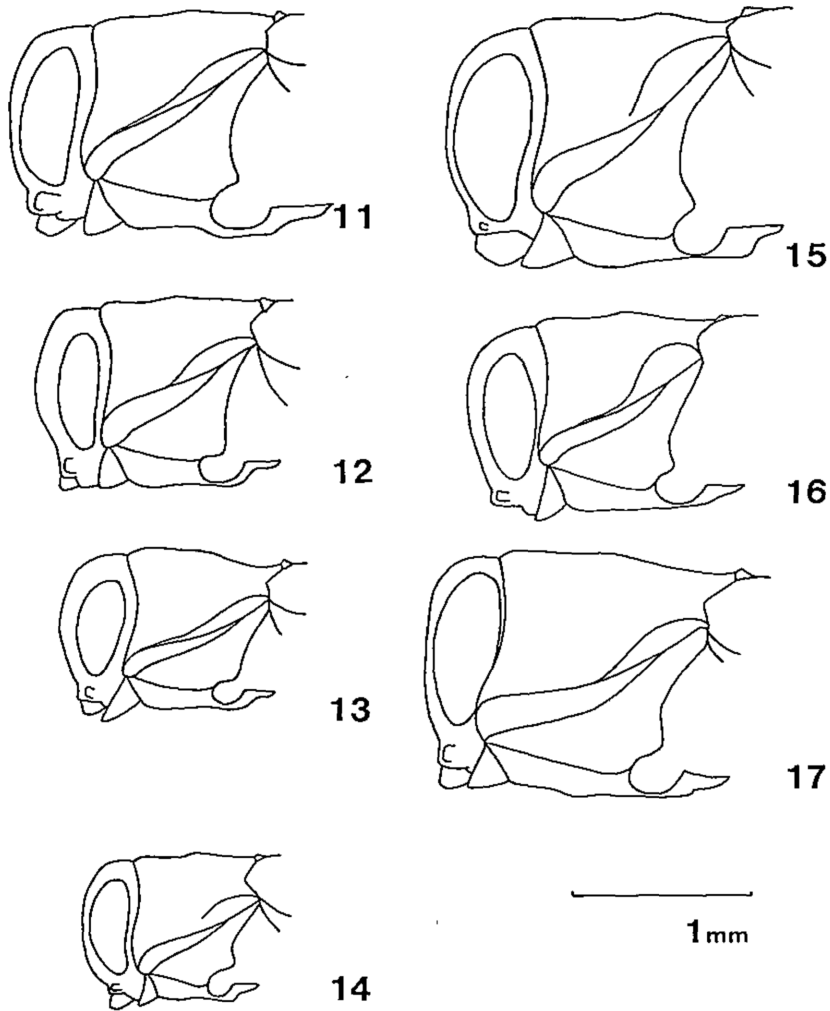
Body moderate, rather robust; above aeneous; beneath black with aeneous tinge; antennae and legs concolorous with body beneath.

Head slightly narrower than the base of pronotum; vertex transversely rugoso-punctate, with a median impression shallow and distinct; frons broader than long, about 1.2 times as wide as long between eyes, distinctly impressed medially below vertex, slightly depressed just above clypeus, transversely grooved along the posterior margins of antennal cavities, transversely rugoso-punctate, and clothed with semirecumbent, inconspicuous, short, cinereous hairs; eyes not so large, slightly converging below in frontal aspect, with the inferior rims almost straight; clypeal suture transverse; clypeus transverse, about 1.4 times as wide as long between antennal cavities, with the anterior margin arcuately emarginate; antennal cavities large; antennae rather lax, eleven-segmented, serrate from the fourth segment, with the first segment stout, slightly longer than the second, which is equally stout to the first, and about 1.3 times as long as the third, the third shortest, the fourth subtriangular.

Pronotum transverse, about 1.6 times as wide as long, widest at the middle; sides slightly sinuate; anterior margin bisinuate, with the median lobe broadly produced; posterior margin slightly narrower than the anterior, trisinate, with the median lobe arcuately emarginate before scutellum; anterior angles acute and sharply produced in dorsal aspect, sharply abased in lateral aspect; posterior angles subrectangular in dorsal aspect; prehumeral carinae arcuate and feeble, extending to the middle, and not conjoined with marginal ones; marginal carinae slightly sinuate; submarginal carinae extending to anterior two-thirds, moderately distant from marginal carinae in anterior half, then approximate to them posteriorly; disc convex, transversely depressed in posterior third; surface transversely rugoso-punctate, evenly clothed with inconspicuous, cinereous hairs. Scutellum with a V-shaped carina, the part before the carina subhexagonal, median projection sharply produced posteriorly.

Elytra about 2.7 times as long as wide, about 4.1 times as long as pronotum, and widest just behind the middle; sides rounded at humeri, slightly convergent to anterior third, expanded and swollen near the middle, then convergent to the tips, which are separately subtruncate and very obsoletely dentate; basal margins carinate, with the lobes subtriangularly produced at the middle; sutural margin slightly elevated in posterior two-thirds; lateral margins unarmed except for the apical parts, where they are obsoletely and finely dentate; humeri slightly prominent, without humeral carinae; disc with the basal depressions large though ill-defined posteriorly; surface evenly and densely rugoso-punctate, evenly clothed with semirecumbent, short, cinereous hairs except for the part just behind the middle, where they are clothed with inconspicuous dark hairs.





Figs. 1-17. *Agrilus* spp., head and thorax in lateral aspect.—1, *A. suginoi* sp. nov.; 2, *A. imasakai* sp. nov.; 3, *A. yamajii* sp. nov.; 4, *A. nakanei* Y. KUROSAWA; 5, *A. euonymi* sp. nov.; 6, *A. yagii* sp. nov.; 7, *A. nishiyamai* sp. nov.; 8, *A. ohnomoi* sp. nov.; 9, *A. yakushimensis* sp. nov.; 10, *A. watanabei* sp. nov.; 11, *A. deguchii* sp. nov.; 12, *A. yonahaensis* sp. nov.; 13, *A. samuelsoni* sp. nov.; 14, *A. iriei* sp. nov.; 15, *A. aritai* sp. nov.; 16, *A. semivittatus* sp. nov.; 17, *A. hokkaidoensis* sp. nov.

Body beneath sparsely clothed with short, recumbent, cinereous hairs. Proster-num convex; gular lobe bilobed, with the anterior margin arcuately emarginate; pro-sternal process declivous posteriorly, subparallel-sided between anterior coxal cavities, then attenuate to the tip, which is acute. Abdomen beneath evenly convex, with the last ventral segment rounded at apex. Pygidium not carinate at the middle, and rounded at the tip. Posterior tarsi distinctly shorter than posterior tibiae; the first segment slightly shorter than the following three united. Claws simply cleft.

Length: 5.6 mm; width: 1.4 mm.

Holotype: ♀, Mt. Mayuyama, Shimabara City, Nagasaki Pref., 16. VIII. 1975, S. IMASAKA lgt.

Remarks: This new species is allied to *A. maculifer* E. SAUNDERS, 1873, from Japan, but can be distinguished by the following characteristics: 1) antennae lax, instead of being compact; 2) clypeus narrower; 3) prehumeral carinae short and not conjoined with marginal carinae, while in *A. maculifer*, they are long and conjoined with marginal carinae; 4) elytra without white spots, while in *A. maculifer*, they are provided with four white spots.

Agrilus yamajii sp. nov.

(Figs. 3, 22)

Body small, subcylindrical, entirely black, lustrous; antennae and legs black with aeneous tinge.

Head narrower than the base of pronotum; vertex feebly and longitudinally im-pressed at the middle, obsoletely and longitudinally rugoso-punctate; frons about as long as wide between eyes, obsoletely and longitudinally impressed for a short distance below vertex, obsoletely rugoso-punctate, clothed with semirecumbent, cinereous hairs, with profound pores behind antennal cavities; eyes rather small, converging below in frontal aspect, with the inferior rims distinctly sinuate; clypeal suture trans-verse, very obsoletely carinate; clypeus transverse, about 1.3 times as wide as long be-tween antennal cavities, with the anterior margin sinuate; antennal cavities large, with the posterior margins feebly carinate; antennae eleven-segmented, serrate from the fourth segment, with the first segment stout, subglobular, slightly shorter than the second, which is equally stout to the first, the third shortest, about 0.8 times as long as the second, the fourth subtriangular, about as long as the second.

Pronotum transverse, about 1.4 times as wide as long, widest at the middle; sides subparallel in anterior half, then sinuously convergent to posterior angles; anterior margin bisinuate, with the median lobe arcuately but feebly produced; posterior margin trisinuate, with the median lobe arcuately emarginate before scutellum; anterior angles acute and produced in dorsal aspect, abased and pointed in lateral aspect; pos-terior angles subrectangular in dorsal aspect; prehumeral carinae sinuate, extending to behind anterior angles, where they are conjoined with marginal carinae; marginal carinae slightly sinuate, but they are distinctly, arcuately abased just behind anterior

angles; submarginal carinae subparallel to marginal carinae in anterior two-fifths, then approximate to them, and conjoined with them before posterior angles; disc convex, longitudinally depressed along prehumeral carinae, with two median depressions, which are situated behind the anterior lobe and just before scutellum; surface transversely rugoso-punctate, sparsely clothed with inconspicuous, cinereous hairs along prehumeral carinae. Scutellum with a transverse carina, the part before the carina subpentagonal, median projection sharply produced posteriorly.

Elytra about 2.6 times as long as wide, about 4.8 times as long as pronotum, and widest just behind the middle; sides rounded at humeri, slightly convergent to anterior three-tenths, expanded and swollen near the middle, then convergent to the tips, which are separately rounded and inconspicuously dentate; basal margins sinuate, with the lobes subtriangularly produced at the middle; sutural margin slightly elevated in posterior two-thirds; lateral margins unarmed; humeri slightly prominent, without humeral carinae; disc with large basal depressions; surface evenly and densely rugoso-punctate, evenly and sparsely covered with inconspicuous, short, blackish hairs.

Body beneath evenly and sparsely clothed with short, fine, cinereous hairs. Prosternum convex; gular lobe bilobed, with the anterior margin arcuately and rather strongly emarginate at the middle; prosternal process distinctly constricted between anterior coxal cavities, broadly tricuspidate at the apex, with the lateral projections produced latero-posteriorly. Abdomen beneath with the first visible ventral segment rather deplanate at the middle, and with the last ventral segment rounded at the apex. Pygidium neither carinate nor pointed at the tip. Posterior tarsi shorter than posterior tibiae, with the first segment slightly shorter than the following three united. Claws simply cleft.

Length: 4.2–4.6 mm; width: 0.9–1.0 mm.

Host plant: *Celtis jessoensis* KOIDZ. (confirmed by O. YAMAJI).

Holotype: ♂, Mt. Takahachi, Tottori Pref., 10. V. 1979 (host out), O. YAMAJI lgt. Allotype: ♀, same data as holotype. Paratypes: 2 ♂♂, 1 ♀, same data as holotype.

Remarks: This new species is closely allied to *A. ronino* OBENBERGER, 1935, from Japan, but can be distinguished by the following characteristics: 1) body smaller; 2) body above entirely black, while in *A. ronino*, it is black with distinctly greenish tinge; 3) pronotum widest just behind anterior angles, while in *A. ronino*, it is widest just behind the middle; 4) prosternal process tricuspidate, instead of monocuspidate.

Agrilus nakanei Y. KUROSAWA, 1963

(Figs. 4, 23)

Agrilus acastus nakanei Y. KUROSAWA, 1963, Bull. natn. Sci. Mus., Tokyo, 6: 106.

Agrilus nakanei: Y. KUROSAWA, 1974, Coleopt. News, (23/24): 3–4.

Specimens examined: 1 ♂, Mt. Odai, 23. VII. 1953, T. NAKANE lgt. (holotype); 1 ♀, Tokyo, 2. VII. 1949, A. YOSHIDA lgt. (paratype); 1 ♀, Mt. Kunimi, Imari

City, Saga Pref., 25. VI. 1978, S. IMASAKA lgt.; 1 ♂, Jinmuji, Kanagawa Pref., 8. VII. 1979, K. SHIOZAKI lgt.; 1 ♀, Koganesawa, Yamanashi Pref., 3. VIII. 1979, S. OHMOMO lgt.; 1 ♀, Akasai, Hyôgo Pref., 26. VII. 1982, M. YAGI lgt.

Remarks: Recently I had an opportunity to examine the type series of *A. nakanei* Y. KUROSAWA. After my close examination, it became apparent that two different species were included in this series. One of them, which is rather common in Tokyo, is new to science. I will describe it below.

Agrilus euonymi sp. nov.

(Figs. 5, 24)

Body small but robust; pronotum black with greenish tinge; elytra dark brassy green in anterior half, and black with slight aeneous tinge in posterior half; body beneath black with slight greenish tinge; antennae and legs concolorous with body beneath.

Head slightly narrower than the base of pronotum; vertex longitudinally and obsoletely rugoso-punctate, with the median impression obsoletely impressed; frons distinctly longer than wide between eyes, with a median groove strongly concave below vertex; eyes large, slightly converging below in frontal aspect, with the inferior rims distinctly sinuate; clypeal suture transversely carinate; clypeus slightly broader between antennal cavities, with the anterior margin distinctly emarginate at middle; antennal cavities large, with the posterior margins carinate, the pores just above posterior carinae transverse, small and profound; antennae eleven-segmented, serrate from the fourth segment, with the first segment stoutest, subglobular, slightly longer than the second, which is equally stout to the first, the third less stout, shorter than the second, the fourth subtriangular, about as long as the second.

Pronotum transverse, about 1.5 times as wide as long, widest just behind the middle; sides evenly arcuate; anterior margin bisinuate, with the median lobe arcuately produced at the middle; posterior margin trisinuate, with the median lobe arcuately emarginate before scutellum; anterior angles acute and produced in dorsal aspect, acute and abased in lateral aspect; posterior angles obtuse in dorsal aspect; prehumeral carinae strongly sinuate, arcuately rounded in posterior half, very strongly sinuate near the middle, then almost straight and closely approximate to marginal carinae anteriorly; marginal carinae slightly sinuate; submarginal carinae subparallel and moderately distant from marginal ones in anterior half, then gradually approximate to them, and connected with them at the posterior fifth; disc convex, transversely but obsoletely depressed behind the median lobe of anterior margin, obsoletely and longitudinally depressed along prehumeral carinae; surface transversely rugoso-punctate. Scutellum transversely carinate; the part before the carina strongly declivous in front, subquadrate; the part behind the carina with the median projection triangularly produced.

Elytra about 2.9 times as long as wide, about 4.0 times as long as pronotum, and

widest just behind the humeri; sides rounded at humeri, slightly convergent to the anterior two-fifths, expanded and swollen near the middle, then convergent to the tips, which are conjoined and slightly produced at the sutural parts, and finely dentate; basal margins arcuately carinate, with the lobes subtriangularly produced at the middle; sutural margin slightly elevated in posterior two-fifths; lateral margins unarmed except for the parts near apices, where they are finely dentate; humeri without humeral carinae; disc strongly depressed behind the basal margin, longitudinally deplanate along suture; surface evenly and densely imbricato-punctate, evenly covered with semirecumbent, dark cinereous hairs in anterior half except for the sides, transversely ornamented with whitish hairs behind the middle, and also covered with dark cinereous hairs in apical parts.

Body beneath clothed with short, fine, cinereous hairs. Prosternum convex, obsoletely rugoso-punctate; gular lobe bilobed, with the anterior margin arcuately and distinctly emarginate at the middle; prosternal process distinctly constricted between anterior coxal cavities, broadly tricuspidate at the apex, with the lateral projections rounded at the tips. Abdomen beneath with the last ventral segment broadly rounded at the apex. Pygidium distinctly carinate at the middle, and rounded at the apex. Posterior tarsi shorter than posterior tibiae, with the first segment about as long as the following three united. Claws simply cleft.

Length: 4.8–6.8 mm; width: 1.3–1.8 mm.

Host plant: *Euonymus japonicus* THUNBERG (confirmed by H. ISHIZUKA and Y. KUROSAWA); *Prunus yedoensis* MATSUM. (confirmed by N. KOBAYASHI).

Holotype: ♂, Kinuta, Setagaya, Tokyo, 18. VI. 1978, Y. KUROSAWA lgt. Allotype: ♀, same data as holotype. Paratypes: 1 ♀, Inogashira, Tokyo, 8. VII. 1954, S. HIRAYAMA lgt. (paratype of *Agrilus acastus nakanei* Y. KUROSAWA, 1963); 1 ♂, Morioka, Iwate Pref., 18. VII. 1958, Y. HIRANO lgt.; 1 ♂, 1 ♀, Suginami, Tokyo, 9. VI. 1965, M. KAWAKAMI lgt.; 2 ♂♂, 2 ♀♀, Shinjuku, Tokyo, 8. VI. 1967, K. TSUJI lgt.; 1 ♀, Shinjuku, Tokyo, 21. VI. 1968, K. TSUJI lgt.; 1 ♂, Shinjuku, Tokyo, 22. VI. 1968, K. TSUJI lgt.; 1 ♂, Shakuji, Tokyo, 31. V. 1968, H. KOBAYASHI lgt.; 2 ♂♂, Shinjuku, Tokyo, 12. VI. 1969, K. TSUJI lgt.; 1 ♂, Kinuta, Setagaya, Tokyo, 28. VI. 1970, Y. KUROSAWA lgt.; 34 ♂♂, 2 ♀♀, Kinuta, Setagaya, Tokyo, 2. VI. 1974, Y. KUROSAWA lgt.; 1 ♂, 1 ♀, Otsuka, Bunkyo, Tokyo, 14. VI. 1977, S. OHMOMO lgt.; 20 ♂♂, 2 ♀♀, Kinuta, Setagaya, Tokyo, 11. VI. 1978, Y. KUROSAWA lgt.; 13 ♂♂, 3 ♀♀, same data as holotype; 1 ♂, Nishi-Agano, Saitama Pref., 18. VI. 1978, K. EMOTO lgt.

Remarks: This new species is closely allied to *A. nakanei* Y. KUROSAWA, 1963, but can be distinguished by the following characteristics: 1) body robuster; 2) pre-humeral carinae more strongly sinuate; 3) elytra bicolorous, while in *A. nakanei*, they are unicolorous; 4) elytra each with a transverse band ornamented with whitish hairs, while in *A. nakanei*, they do not bear any whitish bands.

I also examined the following specimens collected in Kyushu. There are small variations between these and the nominotypical race.

1 ♀, Mt. Fukuchiyama, Fukuoka Pref., 16. VII. 1949, Y. YAMAWAKI lgt. (paratype of *Agrilus acastus nakanei* Y. KUROSAWA, 1963); 2 ♂♂, 1 ♀♀, Okinoshima Is., Fukuoka Pref., 28. VII. 1962, M. SHIGA lgt.

Agrilus yagii sp. nov.

(Figs. 6, 25)

Similar to *A. euonymi* sp. nov., but differing from it in the following characteristics: 1) body smaller; 2) prehumeral carinae sinuate, arcuately rounded in posterior two-thirds, then very closely approximate to the marginal ones, while in *A. euonymi*, they are more strongly sinuate; 3) elytra conjointly subtruncate at the tips, while in *A. euonymi*, they are conjoined and slightly produced at the sutural parts; 4) gular lobe with the anterior margin very obsoletely emarginate at the middle, while in *A. euonymi*, it is distinctly and roundly emarginate at the middle.

Length: 4.1 mm; width: 1.0–1.2 mm.

Host plant: Unknown.

Holotype: ♀, Mt. Takahachi, Tottori Pref., 15. VII. 1979, M. TÔYAMA lgt. (on dead branch of *Quercus mongolica* FISCH. var. *grosseserrata* RAHD. et WILS.). Allotype: ♂, Mt. Kurodake, Oita Pref., 28. VII. 1980, S. IMASAKA lgt.

Remarks: The allotype is somewhat damaged.

Agrilus nishiyamai sp. nov.

(Figs. 7, 26)

Similar to *A. euonymi* sp. nov., but differing from it in the following characteristics: 1) prehumeral carinae subtriangularly arcuate in posterior two-thirds, while in *A. euonymi*, they are roundly arcuate in posterior half; 2) pubescence on elytra unicolorous, while in *A. euonymi*, it is bicolorous; 3) elytra separately rounded at the tips, while in *A. euonymi*, they are conjoined and produced at the sutural parts; 4) gular lobe with the anterior margin subtruncate at the middle, while in *A. euonymi*, it is roundly emarginate at the middle.

Length: 5.6 mm; width: 1.2–1.4 mm.

Host plant: Unknown.

Holotype: ♀, Pihu, Hualien Hsien, Taiwan, 31. V. 1980, A. NISHIYAMA lgt.

Paratype: 1 ♀, same data as holotype.

Remarks: This new species is also allied to *A. acastus* KERREMANS, 1912, from Taiwan and Japan (Tsushima Is.), but can be distinguished from it by the following characteristics: 1) body larger; 2) pubescence on elytra unicolorous, while in *A. acastus*, it is bicolorous.

Agrilus uenoi Y. KUROSAWA, 1963

Agrilus uenoi Y. KUROSAWA, 1963, Bull. natn. Sci. Mus., Tokyo, 8: 102–103.

Agrilus uenoi: Y. KUROSAWA, 1975, Coleopt. News, (27/28): 2–3.

Specimens examined: 1 ♂, Mt. Inutabu, Tokunoshima Is., 28. V. 1972 (host out), M. TAKAKUWA lgt.; 1 ♂, 1 ♀, Yona, Okinawa Is., 19. X. 1963, S. MIYAMOTO lgt.; 1 ♀, Yona, Okinawa Is., 19. X. 1963, Y. HIRASHIMA lgt.; 1 ♀, Mt. Minami-meiji-yama, Okinawa Is., 20. X. 1963, K. MORIMOTO lgt.; 1 ♀, Oku, Okinawa Is., 30. IV. 1979, K. DEGUCHI lgt.; 1 ♀, Mt. Omotodake, Ishigaki Is., 12-16. VI. 1976, T. KOBAYASHI lgt.; 1 ♀, Mt. Omotodake, Ishigaki Is., 6. VII. 1975, T. TAKAHASHI lgt.; 1 ♂, Tonogusuku, Ishigaki City, Ishigakijima Is., 1. V. 1984, K. IHA lgt.; 1 ♂, Sonai, Iriomotejima Is., 2. IV. 1972, K. MATSUDA lgt.; 1 ♀, Iriomotejima Is., K. IKEDA lgt. (New to Tokunoshima Is., Okinawa Is., Ishigakijima Is. and Iriomotejima Is.)

Host plant: *Mallotus japonicus* (THUNBERG) (confirmed by K. IKEDA on Iriomotejima Is.).

Agrilus ohmomi sp. nov.

(Figs. 8. 27)

Body somewhat robust; above black with slight aeneo-greenish tinge; beneath entirely black; antennae and legs black with slight aeneous tinge.

Head narrower than the base of pronotum; vertex longitudinally impressed at the middle, feebly but distinctly prominent on each side of median impression, longitudinally and obsoletely rugoso-punctate; frons slightly longer than wide, about 1.1 times as long as wide between eyes, slightly depressed just below vertex, transversely and obsoletely rugoso-punctate, clothed with semirecumbent and cinereous hairs in frontal half, with the pores just above antennal cavities transverse and profound; eyes subparallel in frontal aspect, with the inferior rims slightly but distinctly sinuate; clypeal suture transverse, slightly carinate; clypeus transverse, about 1.5 times as wide as long between antennal cavities, with the anterior margin slightly and arcuately emarginate at the middle; antennal cavities large, with the posterior margin carinate; antennae eleven-segmented, serrate from the fourth segment, with the first segment stout, subglobular, about 1.2 times as long as the second, which is equally stout to the first, about 1.2 times as long as the third, the fourth subtriangular, about as long as the second.

Pronotum transverse, about 1.4 times as wide as long, widest at the middle; sides evenly arcuate, but they are slightly sinuate before posterior angles; anterior margin bisinuate, with the median lobe arcuately produced; posterior margin bisinuate, with the median lobe subtruncate before scutellum; anterior angles acute and produced in dorsal aspect, acute and abased in lateral aspect; posterior angles subrectangular in dorsal aspect; prehumeral carinae strongly sinuate, strongly arcuate in posterior half, then sinuously and closely approximate to marginal carinae, traceable to the posterior three-fourths; marginal carinae slightly sinuate; submarginal carinae subparallel to and moderately distant from marginal ones in anterior half, then gradually approximate, and connected with them before posterior angles; disc convex, slightly and transversely depressed behind the median lobe of the anterior margin, feebly depressed just

Holotype: ♂, Mt. Omotodake, Ishigakijima Is., IV. 1972, S. MIKAGE lgt. Allotype: ♀, Mt. Omotodake, Ishigakijima Is., 9-25. VI. 1972, M. KUBOKI lgt. Paratype: 1 ♀, Mt. Omotodake, Ishigakijima Is., 14. V. 1973, K. SUGINO lgt.

Agrilus yakushimensis sp. nov.

(Figs. 9, 30)

Body small, subcylindrical; above dark aeneous; body beneath black with slight aeneous tinge; antennae and legs slightly darker than body above.

Head slightly narrower than the base of pronotum; vertex longitudinally impressed at the middle, slightly convex on each side of the median impression; frons about as long as wide between eyes, slightly prominent in dorsal aspect, longitudinally and distinctly impressed for a short distance below vertex at the middle, transversely grooved along posterior margins of antennal cavities, transversely rugoso-punctate, evenly clothed with semirecumbent, cinereous hairs; eyes slightly converging below in frontal aspect, with the inferior rims distinctly sinuate; clypeal suture transverse, not carinate; clypeus about as long as wide between antennal cavities, with the anterior margin arcuately emarginate at the middle; antennal cavities large, with the posterior margins carinate; antennae rather lax, eleven-segmented, serrate from the fourth segment, with the first segment stout, subglobular, about 1.2 times as long as the second, which is equally stout and subglobular to the first, the third rather slender, slightly shorter than the second, the fourth subtriangular, about as long as the second.

Pronotum transverse, about 1.4 times as wide as long, widest just behind the middle; sides somewhat arcuate, slightly expanded near the middle, then convergent to and slightly sinuate just before posterior angles; anterior margin bisinuate, with the median lobe arcuately produced; posterior margin trisinate, with the median lobe arcuately but slightly emarginate before scutellum; anterior angles acute and produced in dorsal aspect, abased in lateral aspect; posterior angles subrectangular in dorsal aspect; prehumeral carinae arcuate, extending to the middle, where they are connected with the marginal ones; marginal carinae sharply defined throughout, slightly sinuate though arcuately abased just behind anterior angles; submarginal carinae moderately distant from marginal ones in anterior half, then approximate, and connected with them at the posterior fifth; disc convex, with a median depression just before scutellum; surface transversely rugoso-punctate, clothed with inconspicuous and cinereous hairs along all the margins. Scutellum with a transverse carina, the part before the carina subpentagonal, the median projection sharply produced posteriorly.

Elytra about 2.9 times as long as wide, about 3.9 times as long as pronotum, and widest just behind the middle; sides obtuse at humeri, slightly convergent to the anterior three-eighths, expanded and swollen near the middle, and then convergent to the tips, which are separately rounded and finely dentate; basal margins carinate, with the lobes subtriangularly produced; sutural margin slightly elevated in posterior third; lateral margins unarmed except for the parts near apices, where they are finely dentate; humeri

not prominent, without humeral carinae; disc rather strongly depressed basally, longitudinally deplanate along the suture; surface evenly and densely rugoso-punctate, covered with semirecumbent, silver hairs except for the areas along the sides, which are clothed with very inconspicuous, short, blackish hairs.

Body beneath clothed with fine, cinereous hairs, those on the median part of prosternum being slightly longer. Prosternum convex, densely but obsoletely rugoso-punctate; gular lobe bilobed, with the anterior margin arcuately emarginate; prosternal process subpentagonal, slightly constricted between anterior coxal cavities, then attenuate to the tip. Abdomen beneath very finely punctured; last ventral segment rounded at the apex. Pygidium longitudinally and distinctly carinate at the middle, longitudinally depressed at both sides of the carina, and rounded at the apex. Posterior tarsi distinctly shorter than posterior tibiae, with the first segment longest, about as long as the following three united. Claws simply cleft.

Length: 4.0–5.8 mm; width: 1.2–1.7 mm.

Host plant: Unknown.

Holotype: ♂, Miyanoura, Yakushima Is., 30. VII. 1982, T. HATAYAMA lgt. Allotype: ♀, same data as holotype. Paratypes: 1 ♀, Miyanoura, Yakushima Is., 15. VII. 1971, J. KOMIYA lgt.; 5 exs., Kuromi, Yakushima Is., 3. VIII. 1972, O. TAMURA lgt.; 3 exs., Okawa, Yakushima Is., 13–14. VII. 1973, A. WATANABE lgt.; 10 exs., Miyanoura, Yakushima Is., 28. VII. 1974, T. MIKAGE lgt.; 1 ♀, Miyanoura, Yakushima Is., 29. VII. 1974, T. MIKAGE lgt.; 2 exs., Okawa, Yakushima Is., 21. VII. 1974, T. KOBAYASHI lgt.; 3 exs., Okawa, Yakushima Is., 14. VII. 1978, Y. ODA lgt.; 2 exs., Miyanoura, Yakushima Is., 22. VII. 1969, H. AKIYAMA lgt.; 1 ♂, Shiratani, Yakushima Is., 26. VII. 1973, T. KOBAYASHI lgt.; 1 ♀, Miyanoura, Yakushima Is., 21. VII. 1973, T. KOBAYASHI lgt.; 1 ♀, Okawa, Yakushima Is., 28. VII. 1978, H. MAKIHARA lgt.; 1 ♂, same data as holotype; 1 ♀, Cape Nagata, Yakushima Is., 3. VIII. 1982, T. HATAYAMA lgt.; 1 ♀, Teuchi, Shimo-koshiki-jima Is., 5. VIII. 1975, H. MAKIHARA lgt.

Remarks: This new species is allied to *A. amamioshimanus* Y. KUROSAWA, 1964, but differs from it in the following characteristics: 1) body slightly larger; 2) head longitudinally and distinctly impressed medially below vertex, while in *A. amamioshimanus*, it is not impressed; 3) elytra distinctly deplanate along suture in anterior half, while in *A. amamioshimanus*, they are slightly deplanate.

Agrilus watanabei sp. nov.

(Figs. 10, 31)

Closely similar to *A. yakushimensis* sp. nov., but differs from it in the following characteristics: 1) body smaller, entirely black with slight violaceous tinge, while in *A. yakushimensis*, it is dark aeneous; 2) head rather strongly produced in dorsal aspect, while in *A. yakushimensis*, it is slightly produced; 3) antennae compact, instead of lax; 4) pronotum with the anterior margin distinctly narrower than the posterior, while in *A. yakushimensis*, it is about as wide as the posterior; 5) prosternum with a

gular lobe strongly and roundly emarginate, while in *A. yakushimensis*, it is slightly and arcuately emarginate.

Length: 4.0 mm; width: 1.0 mm.

Host plant: Unknown.

Holotype: ♂, Okawa, Yakushima Is., 12. VII. 1973, A. WATANABE lgt.

Agrilus deguchii sp. nov.

(Figs. 11, 32)

Body somewhat robust, entirely aeneous, slightly lustrous; body beneath brighter than above; antennae and legs darker.

Head slightly narrower than the base of pronotum; vertex longitudinally but obsoletely impressed at the middle, longitudinally rugoso-punctate; frons slightly broader than long between eyes, evenly rugoso-punctate, impressed medially for a short distance below vertex, transversely grooved along the posterior margins of antennal cavities, evenly and sparsely covered with semirecumbent, cinereous hairs; eyes converging below in frontal aspect, with the inferior rims distinctly sinuate; clypeal suture transversely and obsoletely carinate; clypeus distinctly broader than long between antennal cavities, about 1.5 times as wide as long, with the anterior margin arcuately emarginate at the middle; antennal cavities large, with the posterior margins obsoletely carinate; antennae rather lax, each eleven-segmented, serrate from the fourth segment, with the first segment stout, about 1.3 times as long as the second, which is stout and subglobular, the third less stout, slightly shorter than the second, the fourth subtriangular, about as long as second.

Pronotum transverse, about 1.3 times as wide as long, widest just before the middle; sides arcuately produced though slightly sinuate before posterior angles; anterior margin bisinuate, with the median lobe arcuately produced; posterior margin trisinuate, narrower than the anterior, with the median lobe arcuately emarginate before scutellum; anterior angles acute and rather strongly produced in dorsal aspect, abased in lateral aspect; posterior angles obtuse in dorsal aspect; prehumeral carinae sinuate, broadly rounded in posterior half, then closely approximate to marginal carinae, and connected with them just behind anterior angles; marginal carinae subparallel to and moderately distant from marginal carinae in anterior third, then gradually approximate posteriorly, and connected with them at the posterior fourth; disc convex, with the median depression before scutellum, with lateral depressions along prehumeral carinae; surface evenly but sparsely covered with short, cinereous hairs.

Elytra about 2.7 times as long as wide, about 4.0 times as long as pronotum, and widest just behind the middle; sides rounded at humeri, slightly convergent to the anterior three-tenths, expanded and swollen near the middle, then convergent to the tips, which are separately rounded and finely dentate; humeri not prominent, without humeral carinae; basal margins carinate, with the lobes subtriangularly produced; sutural margin slightly elevated in posterior three-fifths; lateral margins unarmed

except for the apical parts, which are finely dentate; disc with the basal depressions rather large, the sutural area longitudinally depressed for a short distance behind scutellum; surface evenly rugoso-punctate, and evenly and entirely covered with semirecumbent, cinereous hairs.

Body beneath clothed with semirecumbent, cinereous hairs. Prosternum convex, obsoletely rugoso-punctate; gular lobe bilobed, with the anterior margin arcuately emarginate at the middle; prosternal process distinctly declivous posteriorly, subparallel between anterior coxal cavities, then attenuate to the tip, which is narrowly rounded. Abdomen beneath with the last ventral segment broadly rounded at the apex. Pygidium with the median part obsoletely carinate. Posterior tarsi shorter than posterior tibiae; first segment slightly longer than the following three united. Claws simply cleft.

Length: 4.8–6.0 mm; width: 1.2–1.7 mm.

Host plant: Unknown.

Holotype: ♂, Kominato, Amamioshima Is., 21. V. 1981, T. NOGAMI lgt. Allotype: ♀, Yanma, Amamioshima Is., 28. VI. 1978, A. WATANABE lgt. Paratypes: 2 ♂♂, 1 ♀, same data as holotype; 1 ♀, Sueyoshi, Naha City, Okinawa Is., 17. V. 1977, K. DEGUCHI lgt.; 1 ♂, 1 ♀, Sueyoshi, Okinawa Is., 11. V. 1981, K. DEGUCHI lgt.; 1 ♀, Mt. Ohyama, Kumejima Is., 25. VI. 1977, T. TSUTSUMI lgt.; 2 ♂♂, 2 ♀♀, Tonogusuku, Ishigaki City, Ishigakijima Is., 5. V. 1984, K. IHA lgt.

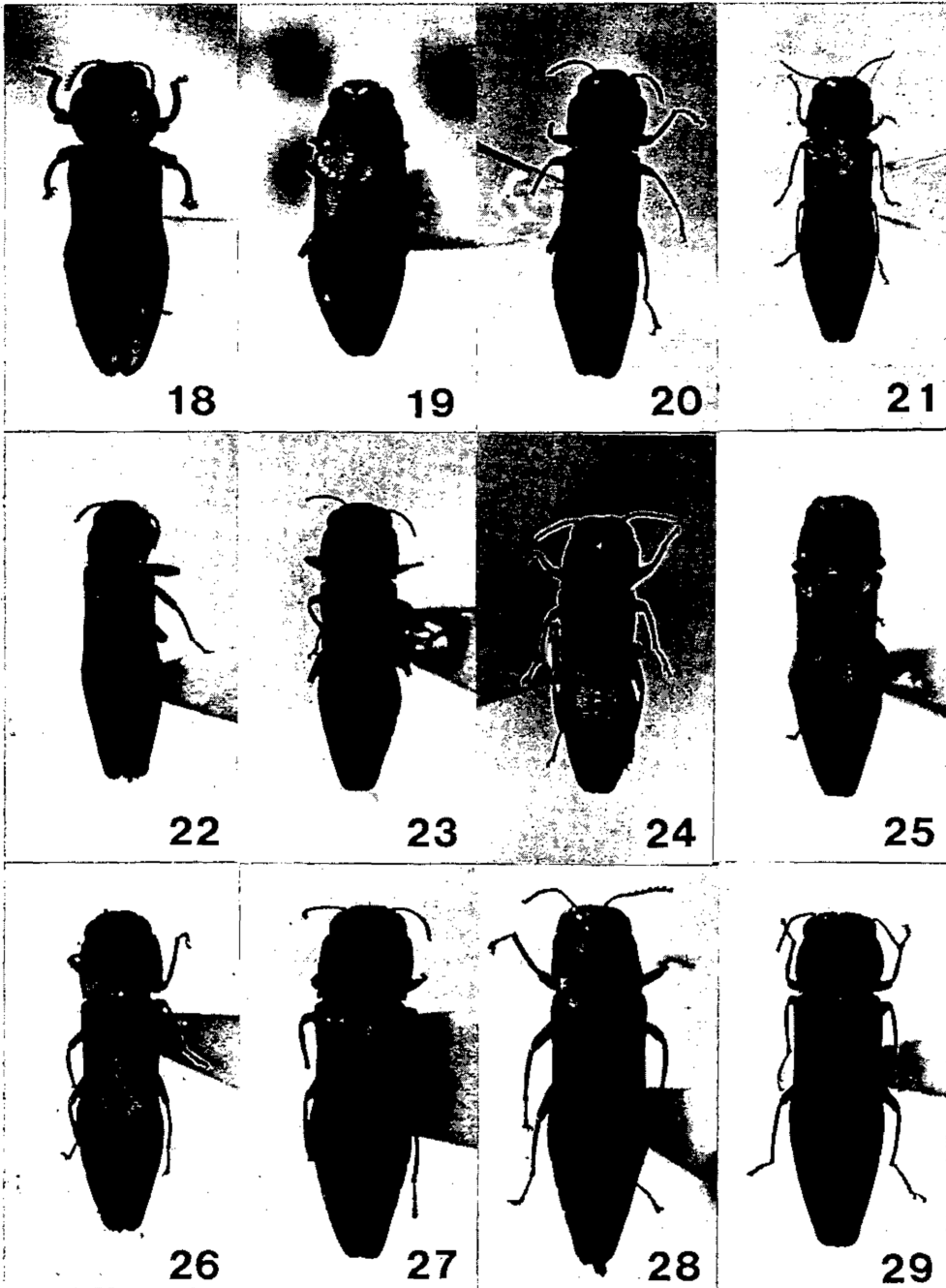
Remarks: This new species is allied to *A. amamioshimanus* Y. KUROSAWA, 1964, and *A. yasumatsui* Y. KUROSAWA, 1964, but can be distinguished from them by the following points: elytra entirely covered with cinereous hairs, while in *A. amamioshimanus* and *A. yasumatsui*, they are covered with cinereous hairs except for the areas along the sides.

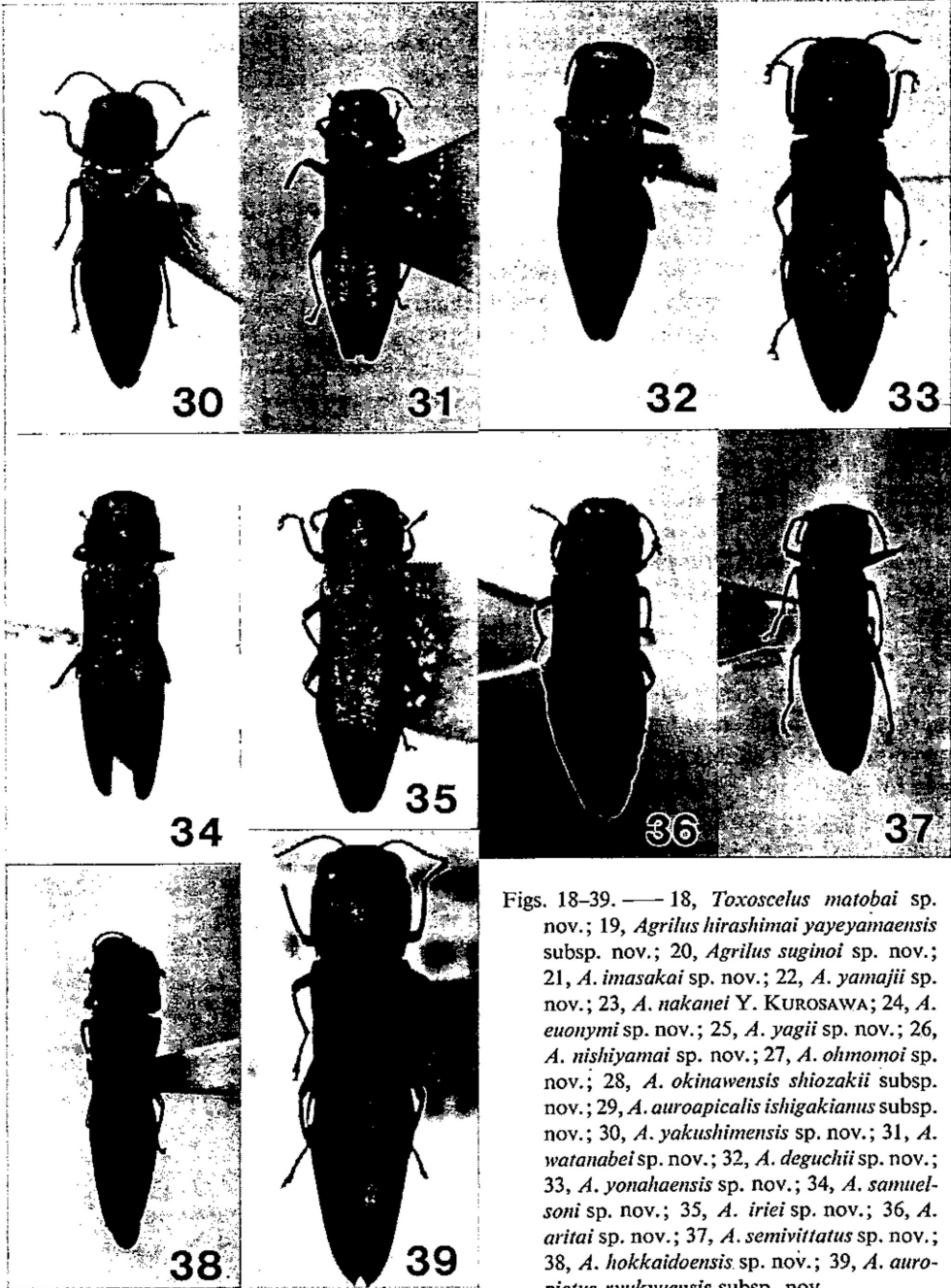
Agrilus yonahaensis sp. nov.

(Figs. 12, 33)

Body small, subcylindrical; above aeneous; beneath black with slight aeneous tinge; antennae and legs concolorous with body beneath.

Head slightly narrower than the base of pronotum; vertex distinctly and longitudinally impressed at the middle, longitudinally rugoso-punctate; frons narrow, about 1.2 times as long as wide between eyes, slightly prominent in dorsal aspect, distinctly and longitudinally impressed for a short distance below vertex at the middle, transversely grooved just above the posterior margins of antennal cavities, densely rugoso-punctate, clothed with semirecumbent, cinereous hairs along eyes and in front; eyes large, subparallel in frontal aspect, with the inferior rims slightly sinuate; clypeal suture transversely carinate; clypeus about 1.3 times as wide as long between antennal cavities, with the anterior margin almost straight; antennal cavities large, with the posterior margins carinate; antennae rather lax, eleven-segmented, serrate from the fourth segment, with the first segment stout, subglobular, and about 1.3





Figs. 18-39. — 18, *Toxoscelus matobai* sp. nov.; 19, *Agrilus hirashimai yayeyamaensis* subsp. nov.; 20, *Agrilus suginoi* sp. nov.; 21, *A. imasakai* sp. nov.; 22, *A. yamajii* sp. nov.; 23, *A. nakanei* Y. KUROSAWA; 24, *A. euonymi* sp. nov.; 25, *A. yagii* sp. nov.; 26, *A. nishiyamai* sp. nov.; 27, *A. ohmomoi* sp. nov.; 28, *A. okinawensis shiozakii* subsp. nov.; 29, *A. auroapicalis ishigakianus* subsp. nov.; 30, *A. yakushimensis* sp. nov.; 31, *A. watanabei* sp. nov.; 32, *A. deguchii* sp. nov.; 33, *A. yonahaensis* sp. nov.; 34, *A. samuelsoni* sp. nov.; 35, *A. iriei* sp. nov.; 36, *A. aritai* sp. nov.; 37, *A. semivittatus* sp. nov.; 38, *A. hokkaidoensis* sp. nov.; 39, *A. auro-pictus ryukyuensis* subsp. nov.

times as long as the second, which is equally stout to the first, the third slightly shorter than the second, the fourth subtriangular, about as long as the second.

Pronotum transverse, about 1.3 times as wide as long, widest at the anterior third; sides arcuate, and slightly sinuate just before posterior angles; anterior margin bisinuate, with the median lobe arcuately and broadly produced; posterior margin slightly narrower than the anterior, trisinuate, with the median lobe arcuately emarginate before scutellum; anterior angles acute and produced in dorsal aspect, abased in lateral aspect; posterior angles subrectangular in dorsal aspect; prehumeral carinae arcuate, extending to the middle, where they are connected with the marginal ones; marginal carinae slightly sinuate, arcuately abased behind anterior angles; submarginal carinae subparallel to the marginal ones in anterior two-fifths, then gradually approximate, and connected with them at the posterior fifth; disc convex, slightly depressed behind the median lobe of anterior margin, with a distinct median depression before scutellum, lateral depressions longitudinally present along prehumeral carinae; surface transversely rugoso-punctate, sparsely clothed with inconspicuous, semirecumbent, cinereous hairs. Scutellum transversely carinate, the part before the carina subpentagonal, and the median projection sharply produced posteriorly.

Elytra about 2.7 times as long as wide, about 4.0 times as long as pronotum, and widest behind the middle; sides obtuse at humeri, slightly convergent to the anterior third, expanded and swollen near the middle, then convergent to the tips, which are separately rounded and finely dentate; basal margin arcuately carinate, with the lobes somewhat angulate at the middle; sutural margin slightly elevated in posterior half; lateral margins unarmed except for the parts near apices, which are finely dentate; humeri not prominent, without humeral carinae; disc distinctly depressed behind the basal margin, longitudinally deplanate along suture in posterior half; surface evenly and densely rugoso-punctate, covered with semirecumbent, silver pubescence except for the areas along the sides, which are clothed with inconspicuous, short hairs.

Body beneath sparsely clothed with recumbent and cinereous hairs. Prosternum convex; gular lobe bilobed, with the anterior margin slightly and arcuately emarginate; prosternal process declivous posteriorly, subparallel between anterior coxal cavities, then strongly attenuate to the tip. Abdomen beneath with the last ventral segment broadly rounded at the apex. Pygidium not carinate, and rounded at the apex. Posterior tarsi shorter than posterior tibiae; the first segment the longest, shorter than the following three united. Claws simply cleft.

Length: 4.6 mm; width: 1.1 mm.

Host plant: Unknown.

Holotype: ♂, Yonahadake, Okinawa Is., 25. VI. 1973, K. AKIYAMA lgt. Paratype: 1 ♂, Mt. Yonahadake, Okinawa Is., 30. VI. 1973, T. KOBAYASHI lgt.

Remarks: This new species is allied to *A. amamioshimanus* Y. KUROSAWA, 1964, but can be distinguished from it by the following characteristics: 1) eyes slightly but distinctly sinuate at the inferior rims, while in *A. amamioshimanus*, they are very slightly sinuate; 2) prehumeral carinae more strongly arcuate than in *A. amamioshimanus*; 3)

gular lobe distinctly emarginate at the middle, while in *A. amamioshimanus*, it is only slightly emarginate.

Agrilus samuelsoni sp. nov.

(Figs. 13, 34)

Body small, subcylindrical, black with a slight aeneous tinge; antennae and legs black.

Head slightly narrower than the base of pronotum; vertex longitudinally impressed at the middle, longitudinally rugoso-punctate; frons slightly prominent in dorsal aspect, slightly narrower than long between eyes, longitudinally but obsoletely impressed for a short distance below vertex at the middle, transversely grooved along the posterior margins of antennal cavities, transversely rugoso-punctate, and clothed with semirecumbent, inconspicuous, cinereous hairs; eyes slightly converging below in frontal aspect, with the inferior rims slightly sinuate; clypeal suture transverse, distinctly carinate; clypeus about as long as wide between antennal cavities, with the anterior margin arcuately emarginate; antennal cavities large, with the posterior margins carinate; antennae rather lax, eleven-segmented, serrate from the fourth segment, with the first segment stout, subglobular, about 1.1 times as long as the second, which is equally stout to the first, the third about 0.7 times as long as the second, and the fourth subtriangular, about as long as the third.

Pronotum transverse, about 1.3 times as wide as long, widest just before the middle; sides arcuate throughout; anterior margin bisinuate, with the median lobe broadly and arcuately produced; posterior margin slightly narrower than the anterior, trisinate, with the median lobe slightly sinuate before scutellum; anterior angles acute and produced in dorsal aspect, sharply abased in lateral aspect; posterior angles subrectangular in dorsal aspect; prehumeral carinae sinuate, traceable to near anterior angles, where they are connected with marginal ones; marginal carinae sinuate; submarginal carinae extending to the anterior two-thirds, moderately distant from marginal ones in anterior half, then approximate to them posteriorly; disc convex, with a median depression posteriorly and lateral longitudinal depressions along prehumeral carinae; surface transversely rugoso-punctate, clothed with semirecumbent, inconspicuous, cinereous hairs medially and along all the margins. Scutellum transversely carinate, the part before the carina subquadrate, median projection sharply produced posteriorly.

Elytra about 3.1 times as long as wide, about 4.0 times as long as pronotum, and widest behind the middle; sides obtuse at humeri, slightly convergent to anterior three-tenths, expanded and swollen near the middle, then convergent to the tips, which are separately rounded and obsoletely dentate; basal margins carinate, with the lobes arcuately produced at the middle; sutural margin slightly elevated in posterior two-thirds; lateral margins unarmed except for apical parts, which are finely and obsoletely dentate; humeri not prominent, without humeral carinae; disc depressed behind the

basal margin; surface coarsely and transversely rugoso-punctate, evenly and rather sparsely covered with semirecumbent, cinereous hairs.

Body beneath sparsely and evenly clothed with short, fine, cinereous hairs. Prosternum convex; gular lobe with the anterior margin arcuately but obsoletely emarginate at the middle; prosternal process slightly constricted between anterior coxal cavities, then strongly attenuate to the apex. Abdomen beneath with the first visible segment weakly depressed at the middle; the last one broadly rounded at the apex. Pygidium with an obsolete median carina, obsoletely and longitudinally depressed along the carina, rounded at the apex. Posterior tarsi distinctly shorter than posterior tibiae, with the first segment the longest, though shorter than the following three united. Claws simply cleft.

Length: 4.0–4.8 mm; width: 0.7–1.0 mm.

Host plant: Unknown.

Holotype: ♂, Mt. Ushikumori, Iriomote Is., 3–7. XI. 1963, G. A. SAMUELSON lgt. Allotype: ♀, Arakawa, Ishigakijima Is., 7. V. 1977, H. HIRAMATSU lgt.

Agrilus iriei sp. nov.

(Figs. 14, 35)

Closely allied to *A. samuelsoni* sp. nov., but differing from it in the following characteristics: 1) body slightly robuster; 2) body above black with a slight greenish tinge, while in *A. samuelsoni*, it is black with a faint aeneous tinge; 3) clypeus distinctly narrower than in *A. samuelsoni*; 4) prehumeral carinae short, arcuate, and not conjoined with the marginal carinae, while in *A. samuelsoni*, they are long, sinuate, and connected with the marginal ones; 5) elytra separately and broadly rounded at the tips, while in *A. samuelsoni*, they are separately and narrowly rounded; 6) elytra deplanate along the suture, while in *A. samuelsoni*, they are very obsoletely deplanate along the suture.

Length: 3.8–4.2 mm; width: 0.9–1.1 mm.

Host plant: Unknown.

Holotype: ♂, Mt. Omotodake, Ishigakijima Is., 17. IV. 1973, H. IRIE lgt. Paratype: 1 ♂, Mt. Omotodake, Ishigakijima Is., 16. IV. 1973, H. IRIE lgt.

Agrilus aritai sp. nov.

(Figs. 15, 36)

Body rather robust; above aeneous; beneath black with slight violaceous tinge; antennae and legs black with aeneous tinge.

Head slightly narrower than the base of pronotum; vertex longitudinally and obsoletely impressed at the middle, distinctly rugoso-punctate; frons slightly broader than long between eyes, longitudinally impressed at the middle, slightly gibbose on each side of the impression, transversely and profoundly grooved along the posterior

margins of antennal cavities, longitudinally rugoso-punctate just below vertex, transversely rugoso-punctate on the other parts, clothed with semirecumbent, cinereous hairs on frontal half; eyes slightly converging below in frontal aspect, with the inferior rims feebly sinuate; clypeal suture transverse; clypeus broad, about 1.8 times as wide as long between antennal cavities, with the anterior margin arcuately emarginate; antennal cavities large, with the posterior margins carinate; antennae rather lax, eleven-segmented, serrate from the fourth segment, with the first segment stout, subglobular, and about 1.2 times as long as the second, which is equally stout and subglobular to the first, the third the shortest, the fourth subtriangular, about 1.2 times as long as the third.

Pronotum transverse, about 1.4 times as wide as long, widest just behind the middle; sides slightly sinuate; anterior margin bisinuate, with the median lobe broadly and arcuately produced; posterior margin slightly narrower than the anterior, somewhat bisinuate, with the median lobe subtruncate before scutellum; anterior angles acute and produced in dorsal aspect, sharply abased in lateral aspect; prehumeral carinae arcuate, extending to the middle, not connected with the marginal ones, which are distinctly sinuate; submarginal carinae subparallel and moderately distant to the marginal ones in anterior third, then gradually approximate posteriorly, and connected with them just before posterior angles; disc convex, with two median depressions behind the anterior lobe and before scutellum respectively, lateral depressions present along prehumeral carinae; surface transversely rugoso-punctate, evenly but sparsely covered with fine, short, cinereous hairs, rather densely clothed with semirecumbent, silver-whitish hairs in median depressions. Scutellum with a transverse carina, the part before the carina being subpentagonal, and the median projection sharply produced posteriorly.

Elytra about 2.6 times as long as wide, about 4.2 times as long as pronotum, and widest just behind the middle; sides rounded at humeri, slightly convergent to the anterior fifth, expanded and swollen near the middle, then gradually convergent to the tips, which are separately rounded and distinctly dentate; basal margins sinuate, with the lobes arcuately produced at the middle; sutural margin slightly elevated in posterior three-fifths; lateral margins unarmed except for apical parts, which are finely but distinctly dentate; humeri slightly prominent, without humeral carinae; disc distinctly depressed along the basal margin; surface evenly imbricato-punctate, ornamented with markings or bands consisting of semirecumbent silver-whitish hairs, arranged as follows: some irregular bands or markings in basal half; a strongly zigzagged band at the apical third; a slightly zigzagged band just before the apex.

Body beneath rather uniformly clothed with fine, semirecumbent, cinereous hairs. Prosternum convex; gular lobe broadly produced, with the anterior margin evenly arcuate; prosternal process slightly expanded just behind anterior coxal cavities, then arcuately attenuate to the tip, which is pointed posteriorly. Abdomen beneath finely and sparsely punctate, with the last ventral segment rounded at the apex. Pygidium longitudinally carinate, the carina projecting at the apex. Posterior tarsi with the

first segment about as long as the following three united. Claws simply cleft.

Length: 7.0 mm; width: 2.0 mm.

Host plant: Unknown.

Holotype: ♀, Hirano, Ishigakijima Is., 30. VIII. 1965, Y. ARITA lgt.

This new species is closely allied to *A. alesi* OBENBERGER, 1935, but can be distinguished by the following characteristics: 1) body smaller than in *A. alesi*; 2) elytral markings different from those of *A. alesi*.

Agrilus semivittatus sp. nov.

(Figs. 16, 37)

Body small, subcylindrical, entirely black with slight greenish tinge.

Head slightly narrower than the base of pronotum; vertex longitudinally but slightly impressed at the middle; frons longer than wide between eyes, longitudinally impressed below vertex at the middle, longitudinally rugoso-punctate below vertex, transversely rugoso-punctate anteriorly, clothed with fine, cinereous hairs; eyes slightly converging below in frontal aspect, with the inferior rims slightly sinuate; clypeal suture transversely carinate; clypeus broader than long between antennal cavities, with the anterior margin arcuately and rather strongly emarginate; antennal cavities large, with the posterior margins carinate, the pores just above posterior carinae profound and transverse; antennae eleven-segmented, serrate from the fourth segment, with the first segment stout, subglobular, and about 1.1 times as long as the second, which is equally stout and subglobular to the first, the third the shortest, the fourth subtriangular, about as long as the second.

Pronotum transverse, about 1.3 times as wide as long, widest just behind the middle; sides rounded just behind anterior angles, subparallel in anterior third, slightly expanded near the middle, then convergent to posterior angles; anterior margin bisinuate, with the median lobe broadly and arcuately produced; posterior margin slightly narrower than the anterior, somewhat trisinuate, with the median lobe slightly emarginate before scutellum; anterior angles acute and produced in dorsal aspect, sharply abased in lateral aspect; posterior angles obtuse in dorsal aspect; prehumeral carinae rather strongly sinuate, arcuately rounded in posterior third, sinuously approximate to the marginal ones near the middle, then closely approximate anteriorly, and traceable to near anterior angles, where they are connected with them; marginal carinae sinuate; submarginal carinae subparallel to and moderately distant from marginal ones in anterior third, then gradually approximate posteriorly, and connected with them at the posterior fifth; disc convex, with two large depressions behind the anterior lobe and just before scutellum respectively, lateral longitudinal depressions present along prehumeral carinae; surface transversely imbricato-rugose, clothed with very inconspicuous, blackish hairs. Scutellum with a transverse carina, the part before the carina subpentagonal, median projection sharply produced posteriorly.

Elytra about 2.7 times as long as wide, about 4.0 times as long as pronotum, and

widest just behind the middle; sides rounded at humeri, slightly convergent to the anterior two-fifths, expanded and swollen near the middle, then convergent again to the tips, which are separately rounded and finely dentate; basal margins sinuate, with the lobes arcuately produced at the middle; sutural margin slightly elevated in posterior two-fifths; lateral margins unarmed except near apices, where they are finely dentate; humeri without humeral carinae; disc with basal depressions along basal margins; surface densely imbricato-punctate, ornamented with semirecumbent, golden hairs in anterior half except for the areas along the sides, clothed with very inconspicuous, black hairs posteriorly and laterally.

Body beneath rather uniformly clothed with short, recumbent, cinereous hairs. Prosternum convex; gular lobe bilobed, with the anterior margin arcuately and slightly emarginate at the middle; prosternal process feebly expanded behind anterior coxal cavities, then roundly attenuate to the tip. Abdomen beneath with the last ventral segment rounded at the apex. Pygidium longitudinally carinate at the middle, and rounded at the apex. Posterior tarsi distinctly shorter than posterior tibiae, with the first segment slightly longer than the following three united. Claws simply cleft.

Length: 4.0–5.0 mm; width: 0.9–1.1 mm.

Host plant: Unknown.

Holotype: ♂, Mt. Konpira, Nagasaki City, Nagasaki Pref., 1. VII. 1954, S. IKUSHIMA lgt. Allotype: ♀, Uoaraigawa, Kunimi Town, Nagasaki Pref., 14. VII. 1979, S. IMASAKA lgt. Paratypes: 3 ♂♂, 1 ♀, same data as holotype.

Remarks: This new species is somewhat allied to *A. pilosovittatus* E. SAUNDERS, 1873, but can be distinguished from it by the difference in elytral ornamentation by pubescence.

Agrilus hokkaidoensis sp. nov.

(Figs. 17, 38)

Body slender, subcylindrical; above black with slight violaceous or greenish tinge; beneath black with slight violaceous tinge; antennae and legs concolorous with body beneath.

Head slightly narrower than the base of pronotum; vertex longitudinally rugoso-punctate; frons distinctly narrower than long between eyes, without median impression, transversely and profoundly grooved along the posterior margins of antennal cavities, transversely rugoso-punctate, uniformly clothed with semirecumbent, cinereous hairs; eyes large, converging below in frontal aspect, with the inferior rims slightly sinuate; clypeal suture transversely carinate; clypeus about as long as wide between antennal cavities, with the anterior margin arcuately but very slightly emarginate at the middle; antennal cavities large, with the posterior margins strongly carinate; antennae lax, eleven-segmented, serrate from the fourth segment, with the first segment stout, subglobular, and about 1.1 times as long as the second, which is equally stout and subglobular to the first, the third the shortest, the fourth subtriangular, about as long as the

first.

Pronotum somewhat transverse, about 1.2 times as wide as long, widest just before the middle; sides sinuate, slightly expanded near the middle, then sinuously attenuate to posterior angles; anterior margin bisinuate, with the median lobe broadly and arcuately produced; posterior margin narrower than the anterior, trisinuate, with the median lobe slightly and arcuately emarginate before scutellum; anterior angles acute and produced in dorsal aspect, acute and sharply abased in lateral aspect; posterior angles subrectangular in dorsal aspect; prehumeral carinae arcuate, extending to the middle, where they are connected with the marginal ones; marginal carinae sharply defined, broadly sinuate; submarginal carinae subparallel to the marginal ones in anterior fourth, then gradually approximate posteriorly, and connected with them before posterior angles; disc convex, transversely depressed behind the anterior lobe, rather strongly depressed before scutellum, and longitudinally depressed along prehumeral carinae; surface transversely imbricato-rugose, clothed with very inconspicuous, short, blackish hairs. Scutellum transversely carinate; the part before the carina strongly declivous in front, and subpentagonal; the part behind the carina with a median projection sharply produced posteriorly.

Elytra about 3.3 times as long as wide, about 3.6 times as long as pronotum, and widest behind the humeri; sides slightly expanded behind the humeri, then sinuously convergent to the tips, though slightly expanded near the middle; tips separately rounded, finely dentate; basal margins arcuately carinate, with the lobes arcuately produced at the middle; sutural margin slightly elevated except for the portion behind scutellum; lateral margins unarmed except for the apical parts, which are finely dentate; humeri without humeral carinae; disc rather strongly depressed along the basal margin, longitudinally and rather strongly deplanate along the suture; surface transversely and densely imbricato-punctate, longitudinally ornamented with semirecumbent, fine, golden hairs along the suture from the basal depressions to the anterior two-thirds, also ornamented with semirecumbent, fine, golden hairs near apices, clothed with very inconspicuous, blackish hairs on the blackish parts.

Body beneath rather uniformly covered with short, recumbent, cinereous hairs. Prosternum convex; gular lobe bilobed, with the anterior margin arcuately emarginate at the middle; prosternal process distinctly expanded to behind anterior coxal cavities, distinctly bi-emarginate at the apex, distinctly and sharply pointed between the emarginations. Abdomen beneath with the last ventral segment rounded at the apex. Pygidium longitudinally carinate at the middle, and rounded at the apex. Posterior tarsi distinctly shorter than posterior tibiae, with the first segment about as long as the following three united. Claws simply cleft.

Length: 7.0 mm; width: 1.5 mm.

Holotype: ♂, Horoka, Hokkaido, 25. VII. 1969.

Remarks: This new species is allied to *A. marginicollis* E. SAUNDERS, 1873, but can be distinguished from it by the following characteristics: 1) body larger; 2) clypeus about as long as wide between antennal cavities, while in *A. marginicollis*, it is narrower

than long; 3) pronotum broader than in *A. marginicollis*; 4) elytra separately rounded at the tips, while in *A. marginicollis*, they are conjointly and broadly rounded.

Agrilus auropictus ryukyuensis subsp. nov.

(Fig. 39)

Distinguished from the nominotypical race from Taiwan and the Japanese race, subsp. *kanohi* Y. KUROSAWA, 1954, by the following characteristics: elytra distinctly bluish tinged, while in the other races, they are not tinged blue.

Holotype: ♂, Shirahama, Iriomote Is., 29. III. 1965, H. YOKOYAMA lgt. Paratypes: 1 ♂, Shirahama, Iriomote Is., 4. IV. 1962, Y. ARITA lgt.; 1 ♂, Mt. Ushikumori, Iriomote Is., 7-10. XI. 1963, G. A. SAMUELSON lgt.; 1 ♂, Shirahama, Iriomote Is., 9. VI. 1972, H. IRIE lgt.; 1 ♂, Mt. Omotodake, Ishigaki Is., 24. VI. 1972, S. OKAJIMA lgt.

摘 要

日本産クリタマムシ属 (*Toxoscelus*) の1新種, ナガタマムシ属 (*Agrilus*) の15新種4新亜種を記載し, あわせて台湾産ナガタマムシ属の1新種を記載した。また, 日本よりナガタマムシ属の1種を新たに記録し, 既知の数種について分布上の新知見を与えた。

株式会社

志賀昆虫普及社

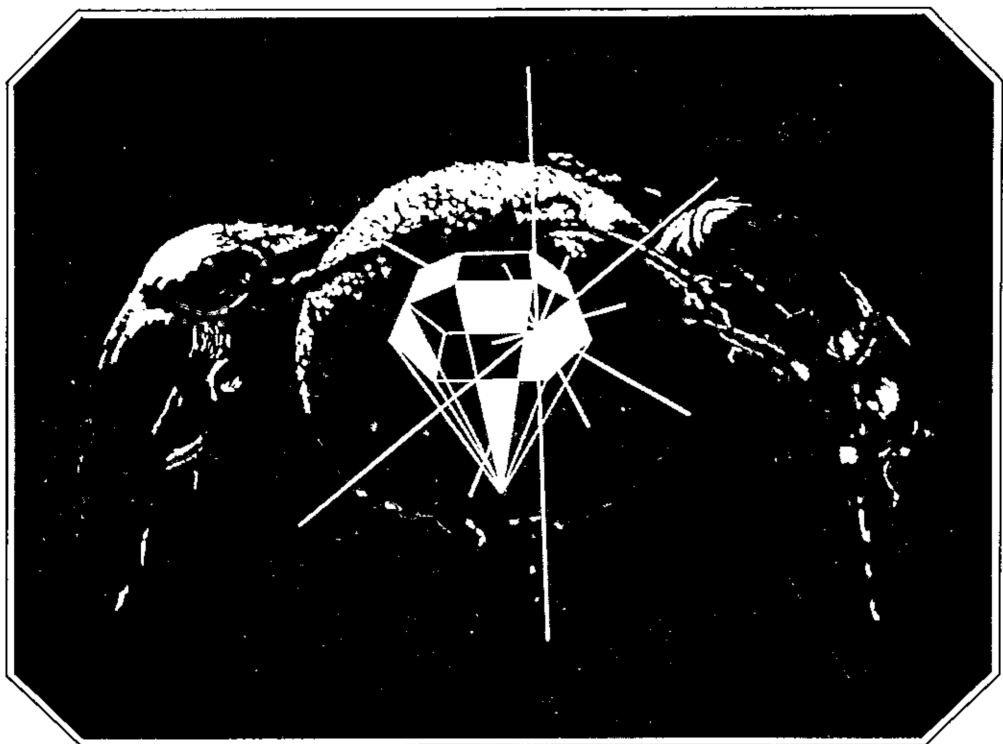
〒110 東京都渋谷区渋谷1丁目7番6号 (宮益坂上)
TEL. 03 (409) 6401 (代) 振替/東京21129



- 新製品/最上質ステンレス製シガ有頭昆虫針
VV. 00. 0. 1. 2. 3. 4. 5. 6号発売中
- 専門用カタログあり 要郵券 140円
- 営業種目 採集瓶・採集箱・幼虫飼育・採集バンド・展翅板類・飼育用具・顕微鏡・標本箱各種・三角ケース・捕虫網・標本瓶・植物採集用具・殺虫管・プレパラート製作用具・名箋・ピンセット・平均台・液浸用管瓶・ルーペ類・コルク類・その他

営業時間：9時～18時

休日：毎日曜、祝祭日、10月1日



真珠より美しく
ダイヤより価値がある
大切な標本を永久に守る
《ドイツ型標本箱》

自然はますます大切なものとなってきました。この不思議な世界を解明する貴重な手掛りとなる昆虫標本は、価値あるものとして永久に保存したいものです。

そんな願いをこめて、タツミ製作所では、昆虫標本の保存に最適なドイツ型標本箱をお届けします。

※すばらしい特長

- くるいのこない良質な木材を使用
- 湿気や乾燥にも強い独特の構造
- パラソールにも変化せず、標本がより美しく見える白色プラスチック底

●高級ニス塗装の丈夫で美しい仕上げ

※標本箱のほか、展翅板など昆虫標本作成に必要な器材もあります。昆虫器材カタログ、昆虫関係輸入図書・委託図書リストもあり。

〒113 東京都文京区湯島一丁目二番五号 株式会社タツミ製作所
郵便振替 東京一三三三七九

(有)タツミ製作所



大型
5,000円 (送料別)

中型
4,500円 (送料別)

この価格は昭和59年9月現在のものです

日本鞘翅目学会会則

1. 会名: 本会は日本鞘翅目学会 (The Japanese Society of Coleopterology) と称する。
2. 目的: 本会は甲虫研究の進展を計り、あわせて甲虫研究者相互の親睦を深めることを目的とする。
3. 総会: 年1回の総会を開くものとする。
4. 活動: 本会は次の活動を行なう。
 - a. 機関誌「ELYTRA」の発行。
 - b. 第2会誌「さやばね」の発行。
 - c. その他、甲虫に関する臨時出版物の発行。
 - d. 年1回の総会。
 - e. その他、必要と思われる一切の活動。
5. 会員: 本会の会員は正会員・維持会員および特別会員からなり、正会員・維持会員は所定の会費を納めるものとする。
6. 役員: 本会には会長ならびに若干名の役員をおくものとする。
7. 会計: 会計年度は1カ年とし、会計報告を行なう。
8. 入会: 本会に入会を希望するものは、指定の会員カードに住所・氏名等を記入し、入会金に1年分以上の会費を添え事務局に申し込むものとする。
9. 会則の変更: 上記会則の変更は総会において承認される。

細 則

- A. 役員は当分の間、下記のものとする。役員は年2回行なわれる ELYTRA 掲載の原著論文の審査、および会務の決定・運営にあたる。

草間慶一 (会長), 衣笠恵士 (副会長), 露木繁雄, 小宮次郎, 中村俊彦, 福田惣一, 大木 裕, 高桑正敏, 藤田 宏, 穂積俊文 (名古屋支部長), 佐藤正孝 (同, 副支部長), 井野川重則, 齊藤秀生, 平山洋人, 新里達也
- B. 入会金は500円とし、年会費は下記の通りとする。

一般: 3,000円 大学生および大学受験生: 2,000円 中・高校生: 1,000円

注 1) 入会金は入会の年次のみ必要。注 2) 維持会員は1口につき5,000円で、会誌は2部ずつ送付される。注 3) 大学院生の年会費は“一般”扱いとする。
- C. 本会の事務局および編集局は当分の間、下記とする。
 - 事務局 (入会の申し込み、会費の納入、その他バックナンバーの取り扱いを除く事務一切)
〒110 台東区東上野 4-26-8 福田惣一方
 - 編集局 (投稿および投稿に関する問い合わせなど、「ELYTRA」・「さやばね」関係一切)
〒110 台東区台東 2-29-6 藤田 宏方
 - 名古屋支部 (名古屋支部会に関する問い合わせ一切)
〒453 名古屋市中村区塩池町 1-10-15 井野川重則方
- D. バックナンバーの取り扱い先は下記とする。事務局および会では一切受け付けていないので注意されたい。

バックナンバー申し込み先: 〒214 川崎市多摩区登戸新町14 TTS昆虫図書
郵便振替 東京 0-73156

The ELYTRA welcomes original articles dealing with various aspects of Coleopterology. It is published semiannually by the Japanese Society of Coleopterology. We are willing to exchange with any publication relating to the study of Coleoptera.

The Japanese Society of Coleopterology

Keiichi KUSAMA, president	Keiji KINUGASA, vice-president	Shigeo TSUYUKI
Jiro KOMIYA	Toshihiko NAKAMURA	Sōichi FUKUDA
Hiroshi OOKI	Masatoshi TAKAKUWA	Hiroshi FUJITA
Toshifumi HOZUMI	Masataka SATŌ	Shigenori INOKAWA
Shusei SAITŌ	Hiroto HIRAYAMA	Tatsuya NIISATO

All inquiries concerning the ELYTRA should be addressed to: Sōichi FUKUDA, c/o 4 chome, 26-8, Higashi-ueno, Taito-ku, Tokyo 110, Japan.

ELYTRA Vol. 13, No. 1 CONTENTS

- MASUMOTO, K.: Tenebrionidae of East Asia (I) Tenebrionid Beetles from
South Sumatra Collected by Mr. Hiroshi MAKIHARA in 1983..... 1
益本 仁雄: 東アジアのゴミムシダマシ (I) 榎原寛氏採集の南スマトラ産
ゴミムシダマシについて
- TÔYAMA, M.: The Buprestid Beetles of the Subfamily Agrilinae from Japan
(Coleoptera, Buprestidae).....19
遠山 雅夫: 日本産ナガタムシ亜科の知見

ELYTRA Vol. 13, No. 1

1985年8月5日 印刷

1985年8月10日 発行

編集者 新 里 達 也

発行者 草 間 慶 一

発行所 日本鞘翅目学会

Japanese Society of Coleopterology

〒110 東京都台東区東上野 4-26-8, 福田惣一方

c/o S. FUKUDA, 4-26-8, Higashi-Ueno,

Taito-ku, Tokyo 110, Japan

印刷所 (株) 国際文献印刷社

〒160 東京都新宿区高田馬場 3-8-8
