

## Notes on Scarabaeid Beetles from Lutao Island off Taiwan

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**Abstract** Scarabaeid beetles from Lutao Island off Taiwan are enumerated. Thirteen species known include a new species of *Maladera*, a new subspecies of *Holotrichia*, and a new subspecies of *Oxycetonia*: *Maladera kumei* sp. nov., *Holotrichia sauteri lutaoensis* subsp. nov. and *Oxycetonia jucunda lutaoensis* subsp. nov.

Recently, through the courtesy of Mr. Kunio KUME, I had an opportunity to study many specimens of scarabaeid beetles from Lutao Island off Taiwan, collected by Mr. J. LO in 1989. These specimens are classified into 7 genera and 13 species, which include *Maladera kumei* sp. nov., *Holotrichia sauteri lutaoensis* subsp. nov. and *Oxycetonia jucunda lutaoensis* subsp. nov.

### List of Species

1. *Maladera kumei* H. KOBAYASHI, sp. nov.  
44 exs., Lutao Is., 11–VI–1989, J. LO leg.
2. *Apogonia bicarinata sauteri* MOSER, 1918  
32 exs., Lutao Is., 6~11–VI–1989, J. LO leg.
3. *Apogonia kamiyai* SAWADA, 1940  
5 exs., Lutao Is., 8~11–VI–1989, J. LO leg.
4. *Holotrichia sauteri lutaoensis* H. KOBAYASHI, subsp. nov.  
18 exs., Lutao Is., 6~11–VI–1989, J. LO leg.  
3 exs., Lutao Is., 19–VII–1989, J. LO leg.
5. *Anomala edentula* OHAUS, 1925  
10 exs., Lutao Is., 6~11–VI–1989, J. LO leg.
6. *Anomala corrugata* BATES, 1866  
1 ex., Lutao Is., 19–VII–1989, J. LO leg.
7. *Anomala sauteri* OHAUS, 1915  
2 exs., Lutao Is., 6~11–VI–1989, J. LO leg.
8. *Anomala expansa lutaoensis* NOMURA, 1977  
10 exs., Lutao Is., 6~11–VI–1989, J. LO leg.  
5 exs., Lutao Is., 19–VII–1989, J. LO leg.
9. *Adoretus formosanus formosanus* OHAUS, 1914  
21 exs., Lutao Is., 6~11–VI–1989, J. LO leg.
10. *Adoretus sinicus* BURMEISTER, 1855

- 12 exs., Lutao Is., 6~11-VI-1989, J. LO leg.
11. *Protaetia inquinata* ARROW, 1913  
8 exs., Lutao Is., 6~11-VI-1989, J. LO leg.
12. *Protaetia culta multimaculata* Y. KUROSAWA, 1959 (Fig. 6)  
6 exs., Lutao Is., 6~11-VI-1989, J. LO leg.
13. *Oxycetonia jucunda lutaoensis* H. KOBAYASHI, subsp. nov.  
26 exs., Lutao Is., 6~10-VI-1989, J. LO leg.

***Maladera kumei* H. KOBAYASHI, sp. nov.**

[Japanese name: Kume-biroudo-kogane]

(Figs. 1, 3)

Form oval. Body reddish brown to dark reddish brown, with head sometimes dark brown, antennal club yellowish brown, tarsi dark brown to dark reddish brown. Surface of body opaque, with iridescence in certain light, anterior part of frons, clypeus, antennae and legs shining (middle tibiae somewhat dull shining; anterior part of frons sometimes opaque).

Clypeus rather coarsely and densely punctate, longitudinally and feebly carinate, without hair on disk, anterior margin feebly emarginate. Frons finely and sparsely punctate in front, minutely and shallowly behind, bearing a few erect hairs near eyes. Antennae 10-segmented, with club 1.5 times as long as footstalk in male, slightly longer in female.

Pronotum sparsely and shallowly punctate, fringed with sparse hairs on each side of anterior margin and on lateral ones, the latter gently curved near the middle, nearly straight behind and feebly sinuate before posterior angles; anterior angles subrectangular in male, somewhat protruding in female. Scutellum broader than long, rather sparsely punctate. Elytral intervals feebly convex, sparsely punctate.

Pygidium almost flattened in male, gently convex in female, somewhat densely punctate, without median smooth line, bearing scattered erect hairs near lateral and apical margins. Posterior femora broad, scantily punctate near basal margin, almost impunctate in other places. Posterior tibiae somewhat dilated, with broadest point across apical third, faintly punctate near inner sides, almost smooth in the middle, outer terminal spur slightly shorter than basal tarsal joint.

Length: 8.0–11.0 mm; breadth: 5.0–6.5 mm.

Holotype: ♂, Lutao Is., Taiwan, 11-VI-1989, J. LO leg. Paratypes: 25 ♂♂, 18 ♀♀, same data as for the holotype.

This new species is allied to *Maladera masumotoi* NOMURA, 1974, but may be distinguished by the following points: clypeus without hair on the disk, differently shaped pronotum, and pygidium without median smooth line.

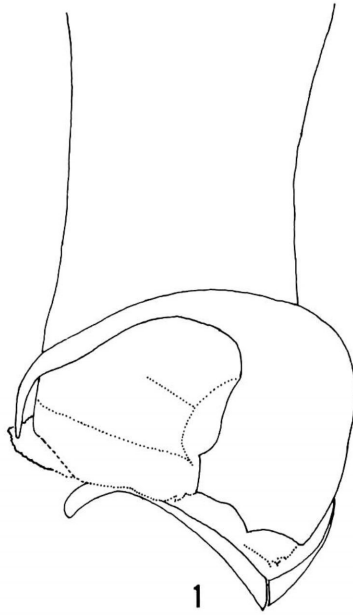


Fig. 1. Male genitalia of *Maladera kumei* H. KOBAYASHI, sp. nov.

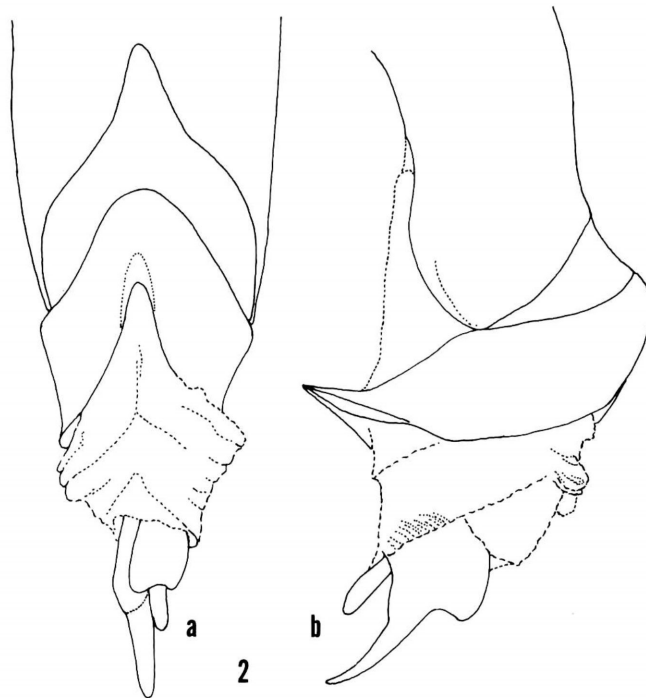


Fig. 2. Male genitalia of *Holotrichia sauteri lutaoensis* H. KOBAYASHI, subsp. nov.; a, dorsal view; b, lateral view.

*Holotrichia sauteri lutaensis* H. KOBAYASHI, subsp. nov.

[Japanese name: Rutao-kurokogane]

(Figs. 2, 4, 7)

*Holotrichia sauteri*: NOMURA, 1977, Tôhō-Gakuhô, (27), p. 92.

This new subspecies may be separated from the nominotypical subspecies by the following points:

Dorsal surface entirely black or blackish brown; tibiae blackish brown to dark reddish brown; antennae, femora and tarsi dark reddish brown to reddish brown. Ventral surface entirely black to dark blackish brown. Surface of body shining.

Pronotum very coarsely but strongly punctate. Each elytron with a sutural and four discal costae, 1st and 2nd costae very conspicuous and convex in basal halves, almost impunctate. Pygidium rather convex near base in male, gently convex in female, densely and finely punctate.

Length: 20.0–22.5 mm; breadth: 11.0–12.0 mm.

Holotype: ♂, Luta Is., 6~11-VI-1989, J. Lo leg. Paratypes: 3 ♂♂, 14 ♀♀, same data as for the holotype; 1 ♂, 2 ♀♀, Luta Is., 19-VII-1989, J. Lo leg.

*Oxycetonia jucunda lutaensis* H. KOBAYASHI, subsp. nov.

[Japanese name: Rutao-koao-hanamuguri]

(Figs. 5, 9)

This new subspecies may be separated from *O. j. kotoensis* NOMURA, 1959, by the following points:

Dorsal surface blackish green to deep greenish black or deep green to green. Ventral surface deeper greenish black than in *O. j. kotoensis*, decorated with sublateral spots on 2nd to 5th segments.

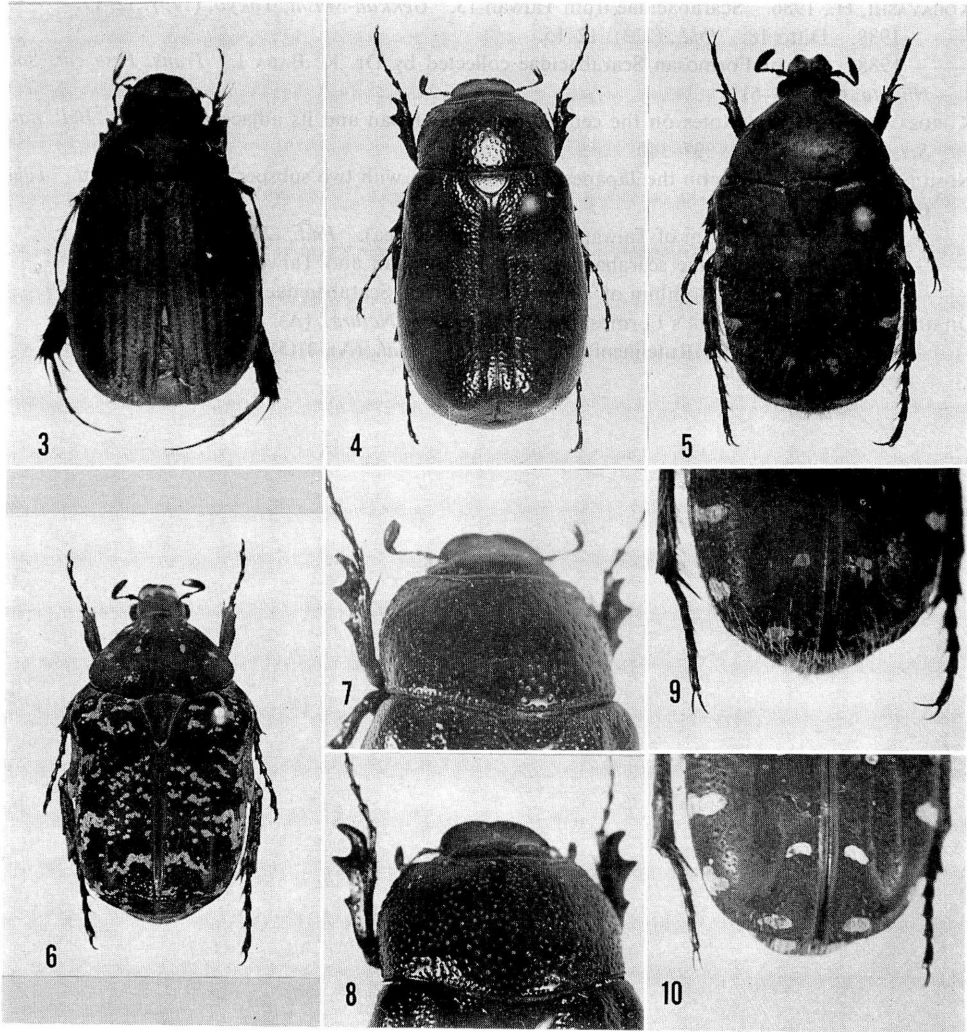
Sternal process broad, somewhat truncated, but gently rounded at apex. Elytra with rather long, somewhat conspicuous hairs on each side and in apical area.

Length: 15.0–18.0 mm; breadth: 8.0–10.0 mm.

Holotype: ♂, Luta Is., 6~10-VI-1989, J. Lo leg. Paratypes: 12 ♂♂, 13 ♀♀, same data as for the holotype.

## 要 約

小林裕和：台湾・緑島のコガネムシ。——筆者は最近、台湾の緑島で採集されたコガネムシを検査する機会に恵まれた。台湾本土のコガネムシについては、近年のいくつもの報告によりかなり詳しい記録が得られているものの、緑島においてはほとんどまとまった記録が残されていない。本稿では、1989年に採集された種類をリストアップするとともに、1種の新種ならびに2種の新亜種を記載した。この報文を書くにあたり、貴重な標本を提供して下さった糸久仁雄氏には、心から感謝申し上げる次第である。



Figs. 3-10. — 3, *Maladera kumei* sp. nov.; 4, *Holotrichia sauteri lutaoensis* subsp. nov.; 5, *Oxycetonia jucunda lutaoensis* subsp. nov.; 6, *Protaetia culta multimaculata* Y. KUROSAWA. — 7, *Holotrichia sauteri lutaoensis* subsp. nov., punctuation of pronotum. — 8, *Holotrichia sauteri sauteri* MOSER, punctuation of pronotum. — 9, *Oxycetonia jucunda lutaoensis* subsp. nov., apical part of elytra. — 10, *Oxycetonia jucunda kotoensis* NOMURA, apical part of elytra.

#### References

- KOBAYASHI, H., 1979. Scarabaeidae from Taiwan 2. *Nat. & Ins, Tokyo*, 14(13): 11-14.  
 ——— 1983. Ditto 9. *Gekkan-Mushi, Tokyo*, (150): 15-18.  
 ——— 1984. Ditto 10. *Ibid.*, (155): 17-20.  
 ——— 1985. Ditto 11. *Ibid.*, (196): 26-29.

- KOBAYASHI, H., 1986. Scarabaeidae from Taiwan 13. *Gekkan-Mushi, Tokyo*, (179): 12-17.
- 1988. Ditto 18. *Ibid.*, (213): 12-15.
- 1988. List of Formosan Scarabaeidae collected by Dr. K. BABA I. *Trans. Essa ent. Soc., Niigata*, (65): 53-61.
- KUROSAWA, Y., 1959. Notes on the cetonid-beetles in Japan and its adjacent regions. *Bull. natn. Sci. Mus., Tokyo*, **44**: 337-340.
- NOMURA, S., 1959. Notes on the Japanese Scarabaeoidea with two subspecies from Taiwan. *Tôhô-Gakuhô*, (9): 39-54.
- 1974. On the Sericini of Taiwan (Col., Scarabaeoidea). *Ibid.*, (24): 81-115.
- 1977. Notes on some scarabaeid-beetles from Japan and Taiwan. *Ibid.*, (27): 77-84.
- 1977. On the Melolonthini of Taiwan (Coleoptera, Scarabaeidae). *Ibid.*, (27): 85-109.
- OHAUS, F., 1921. H. SAUTER'S Formosa-Ausbeute. *Arch. Naturg.*, (A), **82**(4): 1-8.
- 1925. Nachtrag zur Rutelinenfauna Formosas. *Ibid.*, (A), **91**(5): 122-131.