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Title	TYPE SPECIMENS OF MATSUMURA'S SPECIES OF CERCOPOIDEA IN THE HOKKAIDO UNIVERSITY INSECT COLLECTION, JAPAN (HOMOPTERA : AUCHENORRHYNCHA)
Author(s)	Komatsu, Tadashi; Hayashi, Masami
Citation	Insecta matsumurana. New series : journal of the Faculty of Agriculture Hokkaido University, series entomology., 54, 167-186
Issue Date	1998-03
Doc URL	https://hdl.handle.net/2115/9888
Type	departmental bulletin paper
File Information	54_p167-186.pdf



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HOKKAIDO UNIVERSITY INSECT COLLECTION, JAPAN
(HOMOPTERA: AUCHENORRHYNCHA)**

By TADASHI KOMATSU and MASAMI HAYASHI

Abstract

KOMATSU, T. and HAYASHI, M. 1998. Type specimens of Matsumura's species of Cercopoidea in the Hokkaido University Insect Collection, Japan (Homoptera: Auchenorrhyncha). *Ins. matsum. n. s.* 54: 167 – 186.

Original label data associated with all extant known types of the cercopoid species named by Shonen Matsumura in the Hokkaido University Insect Collection are enumerated with exact label data. Thirty-nine lectotypes are newly designated.

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Supported by the Special Grant-in-Aid for Promotion of Education and Science in Hokkaido University provided by the Ministry of Education, Science, Sports and Culture, Japan.

INTRODUCTION

Shonen Matsumura (1872–1960) has been regarded as the founder of the entomology of Japan. He described a large number of new taxa in almost all orders of insects, mainly from the East Asian region. The specimens used by Matsumura (the Matsumura Collection) has been preserved in the Laboratory of Systematic Entomology, Faculty of Agriculture, Hokkaido University, Sapporo, Japan. Since the species descriptions by Matsumura are no longer adequate for present-day species recognition, an investigation of type material is usually an essential part of all revisionary works. However, such a study has been often handicapped by lack of information on the whereabouts of the type material in question. The present study was undertaken to document the types of Matsumura's cercopoid species preserved in the Matsumura Collection, Hokkaido University.

In the cabinet the Matsumura's types of Cercopoidea have been arranged together with additional specimens obtained after the publication of descriptions. A major problem in studying the Matsumura's types was the identification of genuine syntypes. It is necessary to compare the locality and date of all specimens of his species with the information given in the original publication. Matsumura's descriptions often lack information of the number of specimens examined; in such cases all specimens that match the publication data are treated as syntypes. Furthermore, he made some mistakes in reproducing the label data and the sex of type.

Through our investigations on the Matsumura Collection during several years, we have found most of the original specimens used by S. Matsumura. However, the type-series of the following Matsumura's species have not been found up to the present: *formosana*, 1940a: 48 (*Nagaclovia*); *kandai*, 1940a: 57 (*Todophora*); *kuccharonis*, 1942b: 73 (*Sabphora*); *nigricans*, 1904: 43 (*Aphrophora*); *nigripectus*, 1903: 51 (*Ptyelus*); *nigritus*, 1911: 19 (*Ptyelus*); *okinawana*, 1936: 82 (*Aphrophora*); *shirakii*, 1942a: 61 (*Miphora*); *sungariana*, 1942a: 65 (*Obiphora*); *totsozana*, 1942b: 99 (*Yezophora*).

The list of types is arranged in alphabetical sequences by specific epithet. Each name is followed by the author, date, and page reference. The genus name of each species is shown in parentheses () following the publication data; original generic name / subsequent name if changed.

Lectotype designations are made where appropriate. Since the structure of male genitalia is the most useful diagnostic character also in most cases of cercopoid taxonomy, a male specimen is selected as the lectotype when syntypes of both sexes are present. The data of types are exactly reproduced as given on each label, indicating the sequence of labels on the pin. Data on separate labels are indicated by a double slash //. The description on label in Japanese is presented in brackets []. The handwriting identification is enclosed by double quotation marks ". Supplements to the original data are given in parentheses (). Some remarks or comments on the type material are also given when necessary and where appropriate.

FAMILY CERCOPIDAE

apicalis Matsumura, 1903: 19 (*Rhinaulax*)

Lectotype ♂, here designated – [Ibuki], 7/18, Gifu, 163 // Japan Matsumura // det. Dr. Matsumura, "*Rhinaulax apicalis* M." // Type Matsumura.

- arisana* Matsumura, 1940a: 67 (*Kanozata*)
Lectotype ♀, here designated – [(Mt.) Arisan], 11.VII.29, [(T.) Kano], "*Kanozata arisana* Mats."
- bimaculatus* Matsumura, 1907: 106 (*Rhinaulax* / *Stenaulophrys*)
Holotype ♀ – [Hoppo], 8/7, Formosa Matsumura // Type Matsumura // "*Rhinaulax bimaculatus* n. sp."
- elongatus* Matsumura, 1940a: 70 (*Eoscartoides*)
Holotype ♀ – Formosa Matsumura // "*Eoscarta elongatus* Mats." // Type Matsumura // "*E. elongatus*".
- formosana* Matsumura, 1907: 105 (*Cosmoscarta*)
Lectotype ♀, here designated – Taichu, 25/7.
Paralectotypes 3 ♀ – Shoka, 20/7.
Paralectotype 1 ♀ – Shoka, 24/7.
- horishana* Matsumura, 1940a: 69 (*Horiscarta* / *Stenaulophrys*)
Holotype ♂ – [Horisha], 30/4 07 // Type Matsumura // "*E. horishana*" // "*Rhinaulax horishana* Mats." // "*Kuscarta horishana* M."
- kanoniella* Matsumura, 1940a: 66 (*Kanoscarta*)
Lectotype ♀, here designated – [Piyanan], 11.VII.'26, [(T.) Kano] // Type S. Matsumura // "*C. kanoniella* Mats."
Paralectotype 1 ♀ – same data as lectotype // Paratype S. Matsumura // det. Matsumura, "*Kanoscarta kanoniella* Mats."
- koshunella* Matsumura, 1940a: 68 (*Kuscarta*)
Holotype ♀ (abdomen lost) – [Kusukusu~Shijukei], 20-21/VI 1928 // Formosa Matsumura // Type S. Matsumura // "*Kuscarta koshunella*".
- kotoshonis* Matsumura, 1938: 150 (*Eoscarta*)
Lectotype ♀, here designated – [Koto] (= Kotosho; Botel Tobago; Lanyu Is.), [(T.) Kano] // Formosa Matsumura // Paratype S. Matsumura // "*Eoscarta kotoshonis* Mats." // "*Katozata kotoshonis*", "*Thoodzata kotoshonis*".
This species was described on the basis of 3 syntypes (2♂ 1♀), but only a female is stored in the Matsumura Collection.
- rubripennis* Matsumura, 1940a: 73 (*Tadascarta*)
Holotype ♀ – Arisan, 28.IV.1917, Col. T. Shiraki, Col. J. Sonan // det. Matsumura, "*Tadascarta rubripennis* M." // Paratype S. Matsumura // "*Tadascarta* n.g."
- rubroscutellata* Matsumura, 1907: 105 (*Cosmoscarta*)
Holotype ♀ – Koshun, 8/VII 1906 // det. Matsumura, "*rubroscutellata* Mats." // Type Matsumura // "*Marscarta rubroscutellata* Mats."
- siniphila* Matsumura, 1942a: 49 (*Cosmoscarta*)
Holotype ♀ – Kwa-tung, Fukien // 8876 // "*Cosmoscarta siniphila* M."

uchidae Matsumura, 1905: 30 (*Okiscarta*)

Holotype ♀ – [Daito-jima, (T.) Uchida] // "*Cosmoscarta Uchidae* n. sp." // Type Matsumura // "*C. uchidae*".

uchidai Matsumura, 1940a: 42 (*Baibarana*)

Lectotype ♀, here designated – Baibara, 23/VII '25, Formosa, T. Uchida // Type Matsumura // "*Baibarana uchidai* Mats." // "*Takapyelus uchidai* Mats."

wuningiana Matsumura, 1942a: 45 (*Abidama*)

Holotype ♂ – Wuning, Kaingsi (= Kiangsi), 8/12 36 // Type Matsumura // "*Abidama wuningiana* M."

yunnanensis Matsumura, 1942b: 71 (*Phymatostetha*)

Holotype ♂ – Yunnan, 29.VIII.1938, C. W. Wang // Fan Inst. Biol. Peiping // 35 // det. Matsumura, "*P. yunnanensis*" // Type S. Matsumura.

Matsumura applied the genus name as *Phymatostethus*; this is his typographical error for *Phymatostetha*.

zonalis Matsumura, 1907: 106 (*Rhinaulax* / *Eoscarta*)

Lectotype ♂, here designated – Koshun, 7/3 1906 // Type Matsumura // "*Rhinaulax zonalis* n. sp."

Paralectotypes 3 ♂ 2 ♀ – same data as lectotype.

The following specimen is considered to be out of the type-series based on the label data: 1 ex. – [(Mt.) Arisan], 11.VII.27, [(T.) Kano] // Paratype S. Matsumura // "*Eoscarta zonalis* Mats."

FAMILY MACHAEROTIDAE

taiheisana Matsumura, 1940a: 40 (*Asichaerota* (sic) / *Eumachaerota*)

Holotype ♀ – [Taiheizan], 6.VII.26, [(T.) Kano] // "*Asichaerota* (sic) *taiheisana* Mats."

FAMILY APHROPHORIDAE

abieti Matsumura, 1904: 37 (*Aphrophora* / *Todophora*)

Lectotype ♂, designated by Komatsu (1997b) – [Jozankei], 9/9 // "*A. abieti* Mats." // "*Tolophora abieti* Mats." // Lectotype *Aphrophora abieti* Mats. designated by T. Komatsu, 1997.

Paralectotypes 2 ♂ – [Jozankei], 8/28 // Paralectotype *Aphrophora abieti* Mats. designated by T. Komatsu, 1997.

Paralectotype 1 ♀ – [Jozankei], 9/9 // Paralectotype *Aphrophora abieti* Mats. designated by T. Komatsu, 1997.

abieti Matsumura, 1904: 50 (*Ptyelus* / *Aphilaenus*)

Lectotype ♂, here designated – Ziozan (= Jozankei), 9/X.

Paralectotypes 3 ♂ 1 ♀ 1 ex. (abdomen lost) – same data as lectotype.

Paralectotypes 2 ♀ – [Jozankei], 8/28,

Paralectotypes 1 ♂ 1 ex. (abdomen lost), – [Jozankei], [early August], [(Y.) Niijima].

A male specimen with a redtype label can not be designated as the lectotype, according to the label data; 1 ♂, [Jozan] (= Jozankei), 28/VIII 1913, Sapporo Matsumura, Type S. Matsumura, "*Ph. abieti* M."

arisana 1940a: 63 (*Aphrophora* / *Formophora*)

Lectotype ♀, here designated – [(Mt.) Arisan], 17.VII.28, [(T.) Kano] // Type // "*Aphrophora*

arisana M."

The following specimen is considered to be out of the type-series based on the date reference:
1 ♀ – Mt. Ari, Formosa (2300), 8–10–June–1938, Coll. Shizumu Nomura // Paratype Matsumura
// "*arisana*".

arisanella Matsumura, 1940a: 61 (*Miphora*)

Lectotype ♂, here designated – Arisan, 19.X.1925, S. Issiki

Paralectotype 1 ♀ – same data as lectotype // Allotype Matsumura // "*Miphora arisanella* M."

arisanus Matsumura, 1940a: 43 (*Philaenus*)

Holotype ♂ (abdomen lost) – [(Mt.) Arisan], 11.VII.29, [(T.) Kano] // "*Ptyelus arisanus* M." //
Type S. Matsumura // "*arisanus* Mats." // 36 // KGAH-46.

arisanus Matsumura, 1940a: 45 (*Mesoptylus*)

Lectotype ♂, here designated – Arisan, VI.1914, Col. M. Maki // "*Mesoptylus arisanus* Mats."
// Type S. Matsumura // KGAH-49.

Paralectotype 1 ♀ – [Kuyania], 25/IV '07, [(T.) Kano] // "*M. arisanus* M." // Paratype S.
Matsumura // KGAH-50 // Det. KGAH '80, "*Mesoptylus auropilosus* Kato".

Paralectotype 1 ♀ – same data as lectotype // Allotype Matsumura // KGAH-68.

Paralectotype 1 ♀ – same locality, 25/4 '07 // KGAH-69.

arisanus Matsumura, 1942b: 91 (*Toroptyelus*)

Holotype ♂ – [(Mt.) Arisan], 18 V 07, [(T.) Kano] // Type Matsumura // "*Toroptyelus arisanus*"
// KGAH-61 // KGAH det. '80, "*Aphrophora forceps* n. n."

Paratypes 1 ♂ 1 ♀ – [Kuyania], 25/IV '07 // Formosa Matsumura // Paratype Matsumura //
"*Arisanus*" // KGAH-62, 63.

Paratype 1 ♂ – [Kasha], 26.III.26, [(T.) Kano] // Paratype Matsumura // "*Arisanus*" // KGAH-
64.

auropilosus Matsumura, 1907: 113 (*Aphrophora* / *Ariptyelus*)

Lectotype ♂, here designated – Koshun, 3/VII 1906, Formosa Matsumura.

Paralectotype 1 ♂ – Koshun, 2/VII 1906.

Paralectotype 1 ♂ – Koshun, [early July] 1906.

Paralectotypes 2 ♀ – Shoka, 20/VII 1906, Formosa Matsumura.

bicolor Matsumura, 1907: 113 (*Aphrophora* / *Boniphora*)

Lectotype ♂, here designated – Ogasawara, 20 VIII 1905, Matsumura // Type Matsumura //
"*Boniphora bicolor* Mats." // KGAH-39.

Paralectotypes 2 ♀ – [Ogasawara], 20/VIII 1905, [(S.) Matsumura], [Futairo-awafuki] (Japanese
name of this species).

binomoriensis Matsumura, 1934: 74 (*Aphrophora*)

Lectotype ♀, designated by Komatsu (1997a) – [Mt. Yatsugatake], 23.IX. // Type Matsumura //
"*A. binomori* M." // Lectotype *Aphrophora binomoriensis* Mats. designated by T. Komatsu,
1997.

Paralectotype 1 ♀ – Oiwake, Shinano, Japan, 15–8–1930, S. Hirayama // det. Matsumura "*A.*
binomori (sic)" // Paralectotype *Aphrophora binomoriensis* Mats. designated by T. Komatsu,
1997.

bizona Matsumura, 1942b: 97 (*Yezophora*)

Holotype ♂ – Domonrei, prv. H...(indecipherable, but maybe 'Harbin'), Manchouchuo, 11–8–

1940, S. Matsumura // Type Matsumura // "*bizona* M."

bizonalis Matsumura, 1907: 112 (*Aphrophora* / *Ogaphora*)

Lectotype ♂, here designated – Ogasawara, 20.VIII.1905, Matsumura // Type Matsumura // "*Aphrophora bizonalis* Mats."

Paralectotypes 2 ♂ 5 ♀ 1 ex. (abdomen lost) – same data as lectotype.

Paralectotype 1 ♀ – Bonin Isl., 20.VIII '05, Matsumura.

Paralectotype 1 ♂ – Bonin Isl., 20 X '05, Matsumura // Type S. Matsumura // "*bizonalis*" // det. Matsumura, "*Trigophora bizonalis*".

botelensis Matsumura, 1938: 149 (*Aphrophora* / *Kotophora*)

Holotype ♀ – [Koto] (Kotosho; Botel Tobago), Formosa, [(T.) Kano] // 27 // "*Aphrophora botelensis* M." // "*Kotophora botelensis* M." // KGAH-41.

brevis Matsumura, 1904: 35 (*Aphrophora* / *Takaphora*)

Holotype ♀ – [Takao], 7/18 // Dr. Matsumura det., "*brevis*" // Paratype S. Matsumura // "*Takaphora brevis* Mats."

centralis Matsumura, 1940a: 51 (*Jembrana*).

Holotype ♂ – [(Mt.) Arisan], 11 VII 29, [(T.) Kano] // "*Jembrana centralis* Mats."

chuzenjiana Matsumura, 1942b: 77 (*Sinophora*)

Holotype ♀ (abdomen broken) – L. S. Chuzenji, 15-VIII-1939, M. Kubota // Type Matsumura // "*Sinophora chuzenjiana* Mats." // Anufriev det. 1963, "*Sinophora submacula* M. (Metcalf) & H. (Horton)".

Paratype 1 ♀ – L. S. Chuzenji, Nikko, Japan, 24-VII-1939, M. Kubota // Paratype S. Matsumura // "*chuzenjiana* Mats."

compacta Matsumura, 1904: 35. (*Aphrophora* (sic) / *Jophora*)

Holotype ♂ – [Jozankei], 8/28 // det. Dr. Matsumura, "*Aphrophora compacta* M." // Type S. Matsumura "*compacta* Mats." // Type Matsumura "*Jophora*" // "*Jophora compacta* Mats."

coreanus Matsumura, 1940a: 46 (*Mesoptylus*)

Holotype ♀ – Corea, (H.) Okamoto // Type S. Matsumura // "*Mesoptylus coreanus* Mats."

costalis Matsumura, 1903: 35 (*Aphrophora* / *Omalophora*)

Holotype ♀ – [Mombetsu], [mid-July] 90 // Japan Dr. Matsumura.

daitoensis Matsumura, 1940a: 50 (*Jembrana*)

Holotype ♂ – [(Mt.) Toranzan, Daito], 11.VI.15 (33), [(T.) Kano] // Type S. Matsumura // "*J. daitoensis* Mats."

depressus Matsumura, 1942a: 60 (*Maptyelus*)

Holotype ♂ – [Jozankei], 8/28, Sapporo, Matsumura (28 VIII 07) // Type Matsumura // "*Maptyelus depressus* Mats."

dimidiatus Matsumura, 1904: 47 (*Peuceptylus* / *Nikkoptyelus*)

Holotype ♀ – [Nikko], 9.12, [(Y.) Nawa] // 272 // Type S. Matsumura // "*P. dimidiatus*".

domonsis Matsumura, 1942b: 85 (*Tamaphora*)

Holotype ♂ – Domonrei, prv. H(arbin), Manchouchuo, 11-8-1940, S. Matsumura // Type

- Matsumura // "*domonsis* M."
- excavatus* Matsumura, 1940a: 54 (*Jembropsis* / *Egyptyelus*)
 Holotype ♂ – [Numanohira], 13.VII.28, [(T.) Kano] // Type Matsumura // "*Egyptyelus excavatus* M."
- fallax* Matsumura, 1904: 36 (*Aphrophora* / *Trigophora*)
 Holotype ♀ – [Jozan] (= Jozankei), 9/9, [(T.) Oguma] // "*A. fallax* Mats." // Type S. Matsumura // "*fallax* Mats."
- flavomaculata* Matsumura, 1904: 39 (*Aphrophora* / *Yezophora*)
 Lectotype ♂, designated by Komatsu (1997c) – [Ishiyama], 8/7 // Sapporo Dr. Matsumura // det. Dr. Matsumura, "*flavomaculata* n.sp." // Lectotype *Aphrophora flavomaculata* Mats. designated by T. Komatsu, 1997.
 Paralectotype 1 ♀ – same locality and date as lectotype // Paralectotype *Aphrophora flavomaculata* Mats. designated by T. Komatsu, 1997.
 Paralectotypes 3♂ – Sapporo, Dr. Matsumura // Paralectotype *Aphrophora flavomaculata* Mats. designated by T. Komatsu, 1997.
 Paralectotype 1 ♀ – [Maruyama], 8/18 // Paralectotype *Aphrophora flavomaculata* Mats. designated by T. Komatsu, 1997.
 Paralectotype 1 ♀ – [Maruyama], 8/18 // [Monki-awafuki] (Japanese name of this species), "*Aphrophora flavomaculata* Mats." // Paralectotype *Aphrophora flavomaculata* Mats. designated by T. Komatsu, 1997.
- fukuokana* Matsumura, 1942b: 97 (*Yezophora*)
 Holotype ♂ – Hirao, Fukuoka, 30-VIII-1934, S. Kira leg. // Type Matsumura // "*fukuokana* Mats." // "*Europhora fukuokana*".
- fuscus* Matsumura, 1903: 50 (*Ptyelus* / *Philaenus*)
 Holotype ♀ – [Jozankei, (M.) Ishida] // Type S. Matsumura // "*Ph. fuscus* Mats."
- galloisi* Matsumura, 1940a: 72 (*Megafukia* / *Nikkofukia*)
 Holotype ♀ – Japon: Chuzenji, 4-9-1916, Edme Gallois // 2 // Type Matsumura // "*Megafukia galloisi* Mats."
- glabrifrons* Matsumura, 1904: 52 (*Ptyelus* / *Philaenus*)
 Lectotype ♀, here designated – [Maiko], 10/21 (October 25 in the date reference), Japan Matsumura.
 Paralectotype 1 ♀ – same data as lectotype (mounted on the same pin).
- guttatus* Matsumura, 1904: 51 (*Ptyelus* / *Philaenus*)
 Holotype ♀ – Sapporo, XI.1903 // Type S. Matsumura // "*Ph. guttatus* M."
- habonis* Matsumura, 1940a: 59 (*Macrofukia*)
 Lectotype ♂, here designated – Musha, VIII '18, Matsumura // Type, "*habonis* M."
 Paralectotype 1 ♀ – [Kyuhabon], 10.IX.28, Matsumura // "*Macrofukia habonis* M."
- hakonensis* Matsumura, 1942b: 93 (*Trigophora*)
 Holotype ♂ – [Hakone], 7/28 // Type Matsumura // "*hakonensis* Mats."
 Allotype ♀ – Hakone, 28.VII.09 (1907 in the date reference), Matsumura // Allotype Matsumura // "*hakonensis* Mats."

Paratype 1 ♂ – Hakone, 29.VII.09, Matsumura // Paratype Matsumura // "*hakonensis*".

hananoi Matsumura, 1942a: 50 (*Euclovia*)

Holotype ♀ – Ryosuji, Dairen, 22-III-1935, Coll. M. Hanano // Type Matsumura // "*Euclovia hananoi* Mats."

harimaensis Matsumura, 1904: 41 (*Aphrophora*)

Lectotype ♀, designated by Komatsu (1997b) – [Taisanji], 6/28 // Type S. Matsumura // det. Dr. Matsumura "*Aphrophora harimensis* (sic)" // "*Leptophora harimensis* (sic)" // "*Omalophora harimensis* (sic) Mats." // Lectotype *Aphrophora harimaensis* Mats. designated by T. Komatsu, 1997.

hasegawai Matsumura, 1942b: 78 (*Sinophora*)

We were unable to find out the male holotype. According to Prof. Emerit. S. Takagi (pers. comm.), the holotype was entirely damaged by the postal transportation back to Sapporo.

Allotype ♀ – L. S. Chuzenji, 7-VIII-1939, Coll. Masao Kubota // Allotype Matsumura // "*Sinophora hasegawai* Mats." // Anufriev det. 1963, "*Sinophora submacula* M. & H."

Paratype 1 ♂ – Towada, [mid-August] 1905 // Paratype Matsumura // Anufriev det. 1963, "*Sinophora hatimantaiana* Mats."

Paratype 1 ♀ – Mt. Iwate, Morioka, Japan, 19-VIII-1936, Coll. Hitoshi Hasegawa // Paratype Matsumura // Anufriev det. 1963, "*Sinophora submacula* M. & H."

Paratype 1 ♀ – [Karuziawa], 24-VII-1939, H. Hasegawa // Paratype Matsumura // Anufriev det. 1963, "*Sinophora submacula* M. & H."

hatimantaiana Matsumura, 1942b: 78 (*Sinophora*)

Holotype ♂ – Hachimantai, Iwate, 3-Aug.-1937, Coll. Hitoshi Hasegawa // Type Matsumura // "*Sinophora hatimantaiana* Mats."

hiraozanus 1942a: 53 (*Futapterylus*)

Holotype not found (probably lost).

Paratype 1 ♂ – Chikuzen, Mt. Wakasugi, 24.V.1936, S. Kira // Paratype Matsumura // "*Futapterylus hiraozanus* Mats." // KGAH-42.

hirayamai Matsumura, 1942a: 62 (*Nagophora*)

Holotype ♂ – [Daikokumura], Okinawa, VIII.18.1930, [(S.) Hirayama] // "*A. hirayamai*" // "*Nagophora* Type".

Allotype ♀ – [Daikokumura], VIII.18.30, [(S.) Hirayama] // Okinawa Matsumura // "*Nagophora hirayamai* M."

holonbairuna Matsumura, 1942b: 73 (*Sabphora*)

Holotype ♀ – Yakeshi, 35km Holonbairu, North Manchuria, 9-August 1910, Coll. T. Sato // Type Matsumura // "*A. holonbairuna* Mats."

horishana Matsumura, 1940a: 63 (*Aphrophora*)

Although Matsumura (1940a) described this species on the basis of 2 ♂ 2 ♀ specimens, there have been deposited 1 ♂ 3 ♀ syntypes in the Matsumura Collection.

Lectotype ♂, here designated – [Horisha], 30/IV 07, Formosa Matsumura // Type Matsumura // "*Aphrophora horishana* Mats."

Paralectotypes 3 ♀ - same locality and date as lectotype.

hoshiana Matsumura, 1942b: 79 (*Sinophora*)

Holotype ♀ – Hoshi, 10 VIII 39 // Type Matsumura // det. Matsumura, "S. *hoshiana* n." // Anufriev det. 1969, "*Sinophora submacula* M. & H."

Paratype 1 ♀ – [Towada], Japan, [mid-August] 1905 // Paratype Matsumura // "*hoshiana*".

Paratype 1 ♀ – Hatimantai, Iwate, Japan, 2-Aug.-1937, Coll. Hitoshi Hasegawa // Paratype Matsumura // Anufriev det. 1969, "*Sinophora submacula* M. & H."

ibukisanus Matsumura, 1940a: 73 (*Peuceptyelus*)

Lectotype ♀, here designated – [Mt. Ibuki] // Type Matsumura // "*P. ibukisanus*".

Paralectotype 1 ♀ – [Mt. Ibuki], 12 X 12, Matsumura // Paratype S. Matsumura // "*P. ibukisanus* Mats."

ikumae Matsumura, 1915: 175 (*Ptyelus* / *Aphilaenus*)

Holotype ♂ – [(Mt.) Kongozan], [late October] 1914, [(Y.) Ikuma] // Type S. Matsumura // "*ikumae* M."

ikumai Matsumura, 1940a: 55 (*Kitapyelus* / *Koreptyelus*)

Holotype ♀ – [(Mt.) Kongozan], [late October] 1914, [Chosen-Keijo, (Y.) Ikuma] // "*Koreptyelus ikumai* Mats."

inokashiranus Matsumura, 1934: 77 (*Peuceptyelus* / *Oiptyelus*)

Holotype ♂ – Inokashira, Tokyo, Japan, 19-8-1929, S. Hirayama // Type Matsumura // "*P. inokashiranus* n."

inouyei Matsumura, 1942a: 56 (*Jembroides*)

Holotype ♂ – Mt. Ari (2300 m), Formosa, 8-10-June-1938, Coll. Hiroshi Inoue // Type Matsumura // "*Jembroides inouyei* Mats."

ishidae Matsumura, 1903: 36 (*Aphrophora* / *Tobiphora*)

Holotype ♂ – [Jozankei, (M.) Ishida] // Sapporo Dr. Matsumura.

iwateana Matsumura, 1942b: 79 (*Sinophora*)

Holotype ♂ (abdomen broken) – Hachimantai, Iwate, Japan, *2-Aug.-1937, Coll. Hitoshi Hasegawa // "*iwateana* Mats." // "Type *Sinophora iwateana* Mats. 1942" // Anufriev det. 1969, "*Sinophora submacula* M. & H."

japonica Matsumura, 1942b: 80 (*Sinophora*)

Holotype ♂ – Daisetsu, 4-10.VIII.26 // Type Matsumura // det. Matsumura, "S. *japonica* n." // Anufriev det. 1969, "*Sinophora submacula* M. & H."

Allotype ♀ – [Shikaribetsuko], 26/VII 1931, Hokkaido, C. Watanabe // Allotype Matsumura // "*Sino. japonica* Mats." // Anufriev det. 1969, "*Sinophora submacula* M. & H."

Paratype 1 ♂ (wholly damaged by postal transportation; pin only) – [Inako-onsen], 19-VII-1939, Coll. Hitoshi Hasegawa // Paratype Matsumura // Anufriev det. 1969, "*Sinophora submacula* M. & H."

Paratype 1 ♂ – [Nebasawa], 27 VII 38 // Paratype Matsumura // "S. *japonica* Mats." // Anufriev det. 1969, "*Sinophora submacula* M. & H."

Paratypes 3 ♂ – L. S. Chuzenji, Nikko Japan, 13-VIII-1939, M. Kubota // Paratype Matsumura // Anufriev det. 1969, "*Sinophora submacula* M. & H."

Paratypes 2 ♂ – Mt. Daisetsu, 4-10.VIII.1926, Uchida (&) Kono.

Paratype 1 ♂ – Shikaribetsu, '24 VIII 1934, Hokkaido, (T.) Uchida.

- jozanus* Matsumura, 1942b: 75 (*Sappoptyelus*)
 Holotype ♀ – [Jozankei], 28.VIII.'20, Sapporo Matsumura // Type Matsumura // "*jozanus* M."
- kageyamai* Matsumura, 1942a: 58 (*Kageptyelus*)
 Holotype ♀ – [Nojiri], 1.VII.'40 (1. XII. 1940 in the date reference), [(S.) Kageyama] // Type Matsumura // "*Kageptyelus kageyamai* Mats." // KGAH-43.
- kankonis* Matsumura, 1942a: 55 (*Jembrana*)
 Holotype ♂ – Kwanko, 12-vii-1925, S. Issiki (&) S. Akasaka // Type Matsumura // "*J. kankonis*".
- kanmonis* Matsumura, 1940a: 53 (*Jembropsis*)
 Lectotype ♀, here designated – [Kanmon], 18-IV-10, [(I.) Nitobe] // Paratype Matsumura // "*J. kanmonis*".
- kanoi* Matsumura, 1940a: 65 (*Philagra*)
 Lectotype ♂, here designated – [(Mt.) Arisan], 17.VII.28, [(T.) Kano] // Type Matsumura // "*P. kanoi* Mats., Type".
 Paralectotype 1 ♀ – same data as lectotype // "*Philagra kanoi* M."
- kanoniella* Matsumura, 1940a: 64 (*Aphrophora* / *Formophora*)
 Holotype ♀ – (locality indecipherable; 'Shirohagin in Prov. Taichu' in the locality reference), Form. (Formosa), 23.IV.26, [(T.) Kano] // "*Formophoraella kanoniella* Mats."
- kanoniella* Matsumura, 1940a: 51 (*Jembrana*)
 Lectotype ♂, here designated – [(Mt.) Arisan], 8(1)/VI/29, [(T.) Kano] // Type Matsumura // "*J. Kanoniella* Mats."
 Paralectotype 1 ♀ – [(Mt.) Arisan], 11.VII.29, [(T.) Kano] // Allotype Matsumura // "*J. kanoniella* M."
- karafutonis* Matsumura, 1940a: 44 (*Philaenus*)
 Lectotype ♂, here designated – Shisuka, 8.VIII.1914, Saghalin, Adachi (&) Isshiki // Type S. Matsumura // "*karafutonis*".
 Paralectotype 1 ♀ – Shisuka, Saghalin, 8.VIII.1914, Adachi (&) Isshiki // Paratype S. Matsumura // "*karafutonis*".
- karenkonis* Matsumura, 1942a: 52 (*Formophora*)
 Holotype ♀ – Arisan, 19.X.1925, S. Issiki // Paratype Matsumura // "*karenkonis*".
 The following specimen is considered to be a paratype designated by Matsumura based on the label data though it bears no paratype label:
 Paratype 1 ♀ – Mt. Ari, Formosa (1500 m), 8-10-June-1938, Coll. Shizumu Nomura // Type Matsumura // "*karenkonis*".
 Instead, the following specimen is considered to be out of the type-series based on the label data: 1 ♀, Karenko, Formosa, 19. VII 20- VIII 4, T. Okuni, J. Sonan, K. Miy., M. Yosh. // Type Matsumura // "*karenkonis*".
- karenkonis* Matsumura, 1940a: 46 (*Mesoptyelus*)
 Holotype ♀ – Karenko, '19. VII 20- VIII 4, T. Okuni, J. Sonan, K. Miy., M. Yosh. // "*Ptyelus karenkonis* n." // Type Matsumura // KGAH-47.
- kariyai* Matsumura, 1942a: 67 (*Omalophora*)
 Holotype ♂ (♀ in the original description) – Mankarei, S. Kariya, 1935.6.21 // "*Canaliphora*

- kariyai* M. // Type Matsumura // "*Omalophora kariyai* Mats."
- kikuchii* Matsumura, 1942a: 47 (*Ariptyelus*)
Holotype ♂ – Hori, Formosa, 28.IV.1927, K. Kikuchi // Type S. Matsumura // "*kikuchii* M."
- kikuchii* Matsumura, 1940a: 60 (*Awaphora*)
Holotype ♀ – Kyuhabon, 15.8.(1926) // Type Matsumura // "*Awaphora kikuchii* Mats."
- kohozana* Matsumura, 1942a: 52 (*Formophora*)
Holotype ♂ – [(Mt.) Koho], Formosa, 30 VII 39, [(S.) Hirayama] // Type Matsumura // "*kohozana*", "*Tobiphora kohozana* Mats."
- koreana* Matsumura, 1940a: 72 (*Aphrophora* / *Yezophora*)
Holotype ♀ (♂ in the original designation) – [Shakuoji], [Taisho 10th (=1921) Aug. 10] // Type Matsumura // "*Aphrophora koreana* M."
- koreana* Matsumura, 1915: 174 (*Lepyronia*)
Holotype ♂ – [Keijo], V/1914, Mr. [(Y.) Ikuma] // Type Matsumura // "*koreana*".
According to his description, the type locality is Mt. Chohaku in Korea. But, we were unable to find the type specimen collected from this locality.
- koreana* Matsumura, 1942b: 80 (*Sinophora*)
Holotype ♂ – Kantairi, Kannan-Chosen, 2595(=1935) 7 23, Col. K. Nakatomi // Type Matsumura // "*S. koreana* Mats." // Anufriev det. 1969, "*Sinophora japonica* Mats."
- koshireana* Matsumura, 1940b: 49 (*Aphrophora*)
Holotype ♂ – [Koshirei], 21/VIII-1939, Manchoukuo, S. Matsumura (&) H. Kono // det. Matsumura, "*A. koshireiana* (sic)".
- kuccharensis* Matsumura, 1942b: 86 (*Tamaphora*)
Holotype ♀ – [Kushiro Kutcharo], 14/VIII 1917 // Type Matsumura // "*kuccharensis* M." // "*kucharonis* (sic) Mats." // "*Tamaphora kuccharensis* Mats."
- kurilensis* Matsumura, 1942a: 59 (*Lepyronia*) <*L. coleoprata* var.>
Holotype ♂ – Yambetsu, Kunashiri, Kuriles, 22-25.VII.1935 ('29.VII.1926' in the date reference), T. Uchida // "*L. coleoprata kurilensis* Mats."
- kurilensis* Matsumura, 1940a: 62 (*Yezophora*)
Holotype ♂ – Yabetsu, Kunashiri, Kuriles, 22-25.VII.1935 ('22-25.XII.1935' in the date reference), T. Uchida // "*Yezophora kurilensis* Mats."
- kusironis* Matsumura, 1942b: 74 (*Sabphora*)
Holotype ♂ – [Kushiro Kutcharo], 14/VIII 1917 // Type Matsumura // "*kushironis* (sic)".
Allotype ♀ – [Kushiro / Kutcharo], 18 VIII 1917, Matsumura // Allotype Matsumura // "*kusironis*".
Paratype 1♂ – [Kushiro Kutcharo], 14/4 VIII 1917 // Paratype S. Matsumura // "*kusironis* M."
- kuskusuana* Matsumura, 1942b: 72 (*Philagra*)
Holotype ♀ – [Kusukusu, Taiwan], 19.IV.39, [(S.) Hirayama] // Type Matsumura // "*kuskusuana* (sic) Mats."

leukasikini Matsumura, 1942b: 98 (*Yezophora*)

Holotype ♂ – [Harbin, (A.) Leukasikin] // Type Matsumura // "*lukasikini* (sic)".

longiceps Matsumura, 1940a: 63 (*Hiraphora*)

Holotype ♀ – [Ogasawara] // Japan Matsumura // Type Matsumura // "*Aphrophora longiceps* Mats."

lushanensis Matsumura, 1942b: 92 (*Trigophora*)

Holotype ♂ – Lu Shan, Kinagsi (=Kiangsi), 8709 // Type S. Matsumura // "*A. lushanensis* Mats."

magana Matsumura, 1942b: 86 (*Tamaphora*)

Holotype (♂) not found.

Allotype ♀ – Oshoden, Manchouchuo, 8-8-1940, S. Matsumura // Allotype Matsumura // "*magana* Mats."

Paratypes 2 ♀ – Oshoden, Manchouchuo, 8-8-1940, S. Matsumura // Type Matsumura // "*A. magana* Mats."

maritima Matsumura, 1903: 41 (*Aphrophora* / *Petaphora*)

Lectotype ♂, designated by Komatsu (1997c) – Akashi, 18/X 1903 // Type Matsumura // *A. maritima* // *Omalophora paucipuncta* Mats. // Lectotype *Aphrophora maritima* Mats. designated by T. Komatsu, 1997.

Paralectotypes 4♂ 5♀ – same data as lectotype // "*Petaphora maritima* Mats." // Paralectotype *Aphrophora maritima* Mats. designated by T. Komatsu, 1997.

Paralectotype 1 ♀ – same locality, 10/X 1903 // Paralectotype *Aphrophora maritima* Mats. designated by T. Komatsu, 1997.

matusitai Matsumura, 1942b: 87 (*Tamaphora*)

Holotype ♂ – Yarimi onsen, Nippon Alps, Hida, (1939.viii.9), Coll. D. Matusita // Type Matsumura // "*A. matsushitai* (sic) Mats."

medius Matsumura, 1904: 47 (*Peuceptyelus*)

Lectotype ♂, here designated – [Jozan] (= Jozankei), Japan, Matsumura.

Paralectotypes 1 ♂ 3 ♀ – [Jozankei], 8/28 // det. Dr. Matsumura, "*medius* n.sp."

Paralectotypes 4 ♂ 4 ♀ – Moiwa, 13/X.

Paralectotype 1 ♀ – [Sapporo], 8/19.

menoko Matsumura, 1942b: 76 (*Sappoptyelus*)

Holotype ♂ – [Jozankei], 8/28 // Type Matsumura // *menoko* M. // det. Matsumura, "*Menoptelyelus menoko* M." // "*P. nigroscutellatus* Mats."

mitakeana Matsumura, 1942b: 81 (*Sinophora*)

Holotype ♂ – (Mt.) Mitake, Tokyo, Japan, Jun 26 1938, M. Higashino // Type Matsumura // "*mitakeana* Mats." // Anufriev det. 1969, "*Sinophora submacula* M. & H."

miyabei Matsumura, 1911: 19 (*Peuceptyelus* / *Kitaptyelus*)

Lectotype ♂, here designated – Suzuyama, Sachalien, [(K.) Miyabe].

Paralectotype 1 ♀ – same data as lectotype.

Paralectotype 1 ♀ – [Korsakof] // "*Peuceptyelus miyabei* Mats."

Paralectotype 1 ♀ – [Karafuto] (= Sakhalin), Japan, 7/9 07.

- moriokana* Matsumura, 1942a: 67 (*Omalophora*)
 Holotype ♂ – Iwayama, Morioka, Iwateken, Japan, 19-VII-1937, Coll. Hitoshi Hasegawa // Type Matsumura // "moriokana Mats."
 Paratype 1 ♀ – Hachimantai, Iwate, Japan, 1-Aug.-1937, Coll. Hitoshi Hasegawa // "*Aphrophora moriokana* n. sp."
- mukdensis* Matsumura, 1942a: 68 (*Omalophora*)
 Holotype ♂ – [Mukden (Hoten)], 25 VIII 1940 // Type Matsumura // "*A. mukdensis*" // "*Omalophora mukdensis* Mats."
- musashiana* Matsumura, 1934: 74 (*Aphrophora*)
 Holotype ♀ – Mt. Takao, Tokyo, Japan, 8-8-1929, S. Hirayama // Type Matsumura // "*musashiana*".
- mushana* Matsumura, 1940a: 58 (*Nagafukia*)
 Holotype ♀ – Musya, 18-vii-1925, S. Issiki (&) S. Akasaka // "*Nagafukia mushana* Mats."
- mushana* Matsumura, 1942a: 63 (*Obiphora*)
 Holotype ♂ – Musha, 2.V.41, [(S.) Hirayama] // Type Matsumura // det. Matsumura, "*O. mushana* M."
- mushanus* Matsumura, 1940a: 44 (*Philaenus*)
 Lectotype ♂, here designated – Musha, Formosa, Japan, 7-6-1934, S. Hirayama // Type Matsumura // "*Ptyelus mushanus* M."
 Paralectotype 1 ♀ – same locality as lectotype, 8-6-1934 // Paratype S. Matsumura // "*Philaenus mushanus* M."
- nagasawae* Matsumura, 1907: 108 (*Aphrophora*)
 Holotype ♂ – [Taihoku], (date indecipherable), [(T.) Nagasawa] // Type S. Matsumura // "*A. nagasawae*".
- nawae* Matsumura, 1915: 174 (*Lepyronia*) <*L. coleoprata* var.>
 Lectotype ♂, here designated – [Mt. Ibuki], 8/10, [(Y.) Nawa] // "var. *nawae* n. var." // Lectotypus (designated and labelled by K. G. A. Hamilton, but invalid).
- nawae* Matsumura, 1904: 44 (*Peuceptyelus* / *Awafukia*)
 Lectotype ♂, here designated – [Ibuki], 8/22, 270 // Type S. Matsumura // det Dr. Matsumura, "*Nawae*".
 Paralectotype 1 ♂ – [Jozankei], 9/10.
- nengyosanus* Matsumura, 1942a: 60 (*Mesoptyelus*)
 Holotype ♂ – [(Mt.) Nengyo-san], 21/6/30, 17 // "*Mesoptyelus nengyosanus* M." // Type S. Matsumura // KGAH-48 // Det. KGAH '80, "*Mesoptyelus fasciatus* Kato".
- nigra* Matsumura, 1907: 107 (*Lepyronia*) <*L. coleoprata* var.>
 Lectotype ♂, here designated – Sapporo, (M.) Ishida, 4/VII 1904 // "*Lepyronia coleoprata* var. *nigra* Mats."
 Paralectotype 1 ♀ – Sapporo, July 5th 04 // Lectotypus (designated and labelled by K. G. A. Hamilton, but invalid) // *Lepyronia coleoprata* var. *nigra* (labelled by K. G. A. Hamilton).
 Paralectotype 1 ♂ – same data as above // Paratypus (designated and labelled by K. G. A. Hamilton, but invalid)

Paralectotype 1 ♀ – [Farm, Sapporo], July 5th 04.
Paralectotype 1 ♂ – [Sapporo], 30/VII '06 // Japan Kuwayama.

nigriceps Matsumura, 1940a: 54 (*Jembropsis*)

Holotype ♂ – [Kanmon], 18.IV-10, [(I.) Nitobe] // Paratype S. Matsumura // "*Jemb. nigriceps*".

nigrifrons Matsumura, 1904: 49 (*Mesoptelyelus*)

Lectotype ♂, here designated – [Hakone], 7/27 // Dr. Matsumura det., "*Mesoptelyelus nigrifrons* Mats. // Type S. Matsumura // KGAH-55.

Paralectotype 1 ♀ – same data as lectotype // KGAH-56.

nigriventralis Matsumura, 1942b: 89 (*Tonkaephora*)

Holotype ♀ – Oshoden, Manchouchuo, 8-8-1940, S. Matsumura // Paratype Matsumura // "*nigriventralis* M."

nigroscutellata Matsumura, 1942b: 81 (*Sinophora*)

Holotype ♀ – Hachimantai, Japan, 3-VIII-1937, Coll. Hitoshi Hasegawa // Type Matsumura // *Sinophora nigroscutellatus* Mats. // Anufriev det. 1969, "*Sinophora submacula* M. & H."

nigroscutellatus Matsumura, 1904: 45 (*Peuceptelyelus* / *Ainoptyelus*)

Lectotype ♂, here designated – [Jozankei], 8/28.

Paralectotypes 1 ♂ 3 ♀ – same data as lectotype.

Paralectotype 1 ♀ – Sapporo, Matsumura.

Paralectotype 1 ♂ – [Nikko], 9/2, [(Y.) Nawa].

nijimae Matsumura, 1903: 43 (*Aphrophora*)

Holotype ♂ – [Sapporo, Moiwa] // Japan Matsumura.

Later, the status was changed to the variety of *Aphrophora stictica* Matsumura.

nikkona Matsumura, 1942b: 89 (*Tobiphora*)

Holotype ♀ – L. S. Chuzenji, Nikko, 13-VIII-1940, Col. M. Kubota // det. Matsumura, "*Kubophora nikkona* M." // Type Matsumura // "*Tobiphora nikkona* Mats."

nitobei Matsumura, 1940a: 53 (*Jembropsis*)

Holotype ♂ (abdomen lost) – [Kanmon], 18.IV-10, [(I.) Nitobe] // Paratype Matsumura // "*J. nitobei*".

nokoensis Matsumura, 1940a: 56 (*Nokophora*)

Holotype ♀ – Noko, 28.VI-1927, S. Issiki // "*Nokophora nokoensis*".

nomurella Matsumura, 1942a: 54 (*Hosophora*)

Holotype ♂ – Mt. Ari, Formosa (1000 m), 8-10-June-1938, Coll. Shizumu Nomura // Type S. Matsumura // "*nomurella*".

obliquella Matsumura, 1942a: 68 (*Omalophora*)

Holotype ♂ – Hachimantai, Iwate, 1-Aug.-1917 (11-Aug.-1937 in the original description), Coll. Hitoshi Hasegawa // "*Obliquella* Mats" // "Type Matsumura" // "*Omalophora obliquella* Mats."

The date on the type label is considered as an error, judging from the age of the collector, Mr. H. Hasegawa (1918–).

- obtusa* Matsumura, 1903: 39. (*Aphrophora* / *Tamaphora*)
 Lectotype ♀, designated by Komatsu (1997b) – [Tokyo], 6/2 3 // Lectotype *Aphrophora obtusa* Mats. designated by T. Komatsu, 1997.
- ogasawarai* Matsumura, 1940a: 49 (*Peuceptyelus* / *Iwapytelus*)
 Holotype ♀ – Iwate, 43.9.15 // Type S. Matsumura // "*ogasawarai*".
- oiwakeanus* Matsumura, 1942a: 68 (*Omalophora*)
 Holotype ♀ – Oiwake, Shinano japan, 2-7-1929, S. Hirayama // "*oiwakeana* Mats." // Type Matsumura // "*oiwakeana* Mats." // "*Omalophora oiwake*".
- oiwakensis* Matsumura, 1934: 77 (*Peuceptyelus* / *Oiptyelus*)
 Holotype ♂ – Oiwake, Shinano, Japan, 12-7-1929, S. Hirayama // Type Matsumura // "*P. oiwakensis* M.".
- okadae* Matsumura, 1903: 25 (*Euclovia*)
 Holotype ♀ – [Shizuoka], 11.15, [(T.) Okada] // [sakura] (Japanese name of cherry trees) // Holotypus (labelled by G. A. Anufriev) // det. Anufriev, "*Euclovia okadae* Mm.".
- okamotois* Matsumura, 1940a: 47 (*Mesoptyelus*)
 Holotype ♀ – Corea, (H.) Okamoto // Type S. Matsumura // "*M. okamotois*" // KGAH-51.
- okamotois* Matsumura, 1940a: 73 (*Philaenus* / *Aphilaenus*)
 Lectotype ♂, here designated – Corea, (H.) Okamoto // Type Matsumura // "*P. okamotois*" // det. Matsumura, "*Ptyellus* (sic) *okamotois*".
 Paralectotype 1 ♂ – same data as lectotype // Paratype S. Matsumura // "*Philaenus okamotoi* (sic) M.".
 Paralectotype 1 ♂ – same data as lectotype.
- onsenjiiana* Matsumura, 1942a: 49 (*Cercopis* subgen. *Philaenus*)
 Holotype ♂ – Onsenji, Manchouchuo, 17-8-1940, S. Matsumura // Type S. Matsumura // "*Philaenus onsenjiensis* (sic) M.".
 Allotype ♀ – same data as holotype.
- oshodenella* Matsumura, 1942b: 90 (*Tonkaephora*)
 Holotype ♀ – Oshoden ronka, 8.VIII.40 // Type S. Matsumura // "*Tonkaephora oshodenella*".
- oshodensis* Matsumura, 1942b: 93 (*Trigophora*)
 Holotype ♂ – Oshoden, Manchouchuo, 8-8-1940, S. Matsumura // Type Matsumura // "*oshodensis*".
 Paratype 1 ♂ – Manch. Shinkairei, 8.VIII.40, Matsumura // Paratype Matsumura // "*oshodensis*".
 Paratype 1 ♂ – Shinkairei, 9.VIII.40, S. Matsumura // Paratype Matsumura // "*oshodensis*".
 Paratype 1 ♀ – Shinkairei, prov. Tonka, Manchouchuo, 9-8 1940, S. Matsumura // Paratype Matsumura // "*oshodensis*".
 Paratype 1 ♀ – Shin Kairei, 9.VIII.40, Matsumura // Paratype Matsumura // "*oshodensis*".
- pallescens* Matsumura, 1942a: 70 (*Peuceptyelus*)
 Holotype ♂ – [Jozankei], 8/2 8 // Type Matsumura // "*pallescens* Mats.".
- palludina* Matsumura, 1942b: 96 (*Yaphora*)
 Holotype ♂ – [Inako], 20-VII-1938, [(H.) Hasegawa] // Type Matsumura // "*palludina* Mats.".

paucipuncta Matsumura, 1942a: 69 (*Omalophora*)

Holotype ♀ (♂ in the original designation) – [Mukden (Hoten)], 25/VIII-1939, Manchoukuo, S. Matsumura (&) H. Kono // Type Matsumura // "*Petaphora paucipuncta* Mats."

peanensis Matsumura, 1940b: 49 (*Aphrophora*)

Lectotype ♂, here designated – [Peian], Manchoukuo, 12/VIII-1939, S. Matsumura (&) H. Kono // "*A. peanensis* Mats." // Allotype Matsumura, "*A. peanensis*" // "Type *Kitaphora*" // "*Yezophora peanensis* Mats."

pectoralis Matsumura, 1903: 34 (*Aphrophora* / *Omalophora*)

Lectotype ♀, desingated by Komatsu (1997b) – [Sapporo], [(M.) Ishida] // Type Matsumura // "*pectoralis* Mats." // Lectotype *Aphrophora pectoralis* Mats. designated by T. Komatsu, 1997. Paralectotype 1 ♀ – same data as lectotype // Paralectotype *Aphrophora pectoralis* Mats. designated by T. Komatsu, 1997.

piceipectus Matsumura, 1940a: 49 (*Nagaclovia*)

Holotype ♀ – [Hinokiyama], 24 IV 24, [(T.) Kano] // Type Matsumura // "*Nagaclovia piceipectus* M."

putealis Matsumura, 1903: 30 (*Aphrophora* / *Obiphora*)

Lectotype ♀, designated by Komatsu (1997a) – Jozankei, 15/VIII 1902 // Lectotype *Aphrophora putealis* Mats. designated by T. Komatsu, 1997.

Paralectotypes 3 ♀ – Ziozan (= Jozankei), 28/VII // Paralectotype *Aphrophora putealis* Mats. designated by T. Komatsu, 1997.

Paralectotype 1 ♀ – Sapporo, [(M.) Ishida] // Paralectotype *Aphrophora putealis* Mats. designated by T. Komatsu, 1997.

In Komatsu (1997a) additional two females (15/VII 1905 Jozankei) were erroneously designated as paralectotypes. Based on the date reference, these two specimens should be eliminated from the type-series.

quadriguttata Matsumura, 1907: 112 (*Aphrophora*)

Holotype ♂ – Akabane, (T.) Uchida // "*4-guttata*" // Type Matsumura, "*4-guttata*" // "Type *Yezophora*" // "*Yezophora matsumurai* Oshanin".

rarasana Matsumura, 1942a: 54 (*Hosophora*)

Holotype not found, maybe lost.

Allotype ♀ – Arisan, 13.VII.1938, [(T.) Kano] // Allotype Matsumura // "*rarasana* Mats."

rectella Matsumura, 1942a: 64 (*Obiphora*)

Holotype ♀ – Lu Shan, Kiangsi, 8650 // Type S. Matsumura // "*rectella* Mats."

rokurinzana Matsumura, 1940a: 52 (*Jembropsis*)

Holotype ♂ – Rokurinzan, 12.VII.27 // Type Matsumura // "*Jembropsis rokurinzana*".

rugosa Matsumura, 1903: 37 (*Aphrophora* (sic) / *Tobiphora*)

Lectotype ♂, designated by Komatsu (1997c) – [Jozankei], 8/X, [(Y.) Nijima] // Type S. Matsumura // "*Tobiphora*" // "*A. rugosa* Mats." // Lectotype *Aphrophora rugosa* Mats. designated by T. Komatsu, 1997.

Paralectotype 1 ♀ – same data as lectotype // Paralectotype *Aphrophora rugosa* Mats. designated by T. Komatsu, 1997.

- Paralectotype 1 ♂ – [Jozan] (= Jozankei), 9/X // Sapporo Matsumura // "*Tobiphora rugosa* Mats." // Paralectotype *Aphrophora rugosa* Mats. designated by T. Komatsu, 1997.
- sachalina* Matsumura, 1942b: 98 (*Yezophora*)
 Holotype ♂ – Mt. Totso, Saghalien, Japan, 29-July-1938, Coll. Hitoshi Hasegawa // Type Matsumura // "*sachalina*".
- sachalinensis* Matsumura, 1907: 109 (*Aphrophora*)
 Lectotype ♂, here designated – [Pilleo], 13/VIII 1906 // "*Aphrophora sachalinensis* n. sp." // Paratype S. Matsumura // "*sachalinensis* Mats."
- sachalinensis* Matsumura, 1915: 175. (*Ptyelus* / *Neophilaenus*)
 Lectotype ♂, here designated – Corsakof, (Y.) Ikuma, 8/14 // <2>.
 Paralectotypes 1 ♂ 1 ♀ – Saghalin, (Y.) Ikuma.
- satoi* Matsumura, 1942b: 99 (*Yezophora*)
 Holotype ♂ – Holonbairu Yakeshi, 9.VIII.40, T. Sato // Type Matsumura // "*satoi* M."
- sawadai* Matsumura, 1942a: 57 (*Jembrophora*)
 Holotype ♂ – 2000-2500 m, near Hattuukan, Taityu-syu (Formosa), 24, June, 1939, Hiromasa Sawada // Paratype Matsumura // "*Jembrophora sawadai* M."
- scutellata* Matsumura, 1904: 34 (*Aphrophora* / *Trigophora*)
 Lectotype ♀, designated by Komatsu (1997a) – Jozankei, 8/28 // Type Matsumura // Lectotype *Aphrophora scutellata* Mats. designated by T. Komatsu, 1997.
 Paralectotype 1 ♀ – [Jozankei], 8/28 // "*scutellata* Mats." det. Matsumura // Paralectotype *Aphrophora scutellata* Mats. designated by T. Komatsu, 1997.
- seitonis* Matsumura, 1942b: 76 (*Seiphora*)
 Holotype ♂ – Tsingtao, China, June-21-1937, Coll. Sub.Takagi // Type Matsumura // "*Seiphora seitonis*".
 Paratype 1 ♂ – same data as holotype // Paratype Matsumura // "*seitonis*".
- sericella* Matsumura, 1942b: 87 (*Tamaphora*)
 Holotype ♂ – Oshoden, Manchouchuo, 8-8-1940, S. Matsumura // "*sericella* Mats."
- shokanus* Matsumura, 1942a: 47 (*Ariptyelus*)
 Holotype ♂ – Shoka, 20.VII.1906, Matsumura // Type S. Matsumura // "*Ariptyelus shokanus* M."
 Allotype ♀ – Hori, 8.II.38, [(S.) Hirayama] // Formosa Matsumura // Paratype Matsumura // "*Ariptyelus shokanus* M."
- sinalca* Matsumura, 1942b: 95 (*Tukaphora*)
 Holotype ♀ – Lu Shan, Kiangsi, 8708 // Type Matsumura // "*A. sinalca*" // "*Tukaphora sinalca* Mats."
- sinjonis* Matsumura, 1942a: 64 (*Obiphora*)
 Holotype ♀ – [Shinjo, Yamagata], 1935, [(S.) Kanda] // Type S. Matsumura // "*A. sinjonis* Mats."

stictica Matsumura, 1903: 42 (*Aphrophora* / *Atuphora*)

Lectotype ♂, designated by Komatsu (1997a) – [Gifu], 7/13 // Lectotype *Aphrophora stictica* Mats. designated by T. Komatsu, 1997.

Paralectotype 1♂ – [Hikosan], 8.9, [(M.) Yano], 15 // Paralectotype *Aphrophora stictica* Mats. designated by T. Komatsu, 1997.

Paralectotype 1♂ – [Gifu], 7/13 // Paralectotype *Aphrophora stictica* Mats. designated by T. Komatsu, 1997.

Paralectotype 1♂ – [Tokyo], [mid-July] 98 // Japan Dr. Matsumura // Paralectotype *Aphrophora stictica* Mats. designated by T. Komatsu, 1997.

takagii Matsumura, 1940a: 64 (*Aphrophora* / *Sabphora*)

Lectotype ♂, here designated – Chengchin, North-Manchuria, V-28-193. (1938), Coll. Sab. Takagi // Type S. Matsumura // "*A. takagii*".

takaii Matsumura, 1934: 75 (*Aphrophora*)

Lectotype ♂, designated by Komatsu (1997b) – [(Mt.) Yatsugatake], [(K.) Takai] // Type Matsumura // "*A. takai* (sic) M." // Lectotype *Aphrophora takaii* Mats. designated by T. Komatsu, 1997.

takaii Matsumura, 1934: 78 (*Ptyelus* / *Neophilaenus*)

Holotype ♀ – [(Mt.) Yatsugatake], (K.) Takai // Type Matsumura // "*Philaenus takaii* Mats.".

takaosanus Matsumura, 1934: 78. (*Peuceptyelus* / *Mimoptylus*)

Holotype ♀ – Mt. Taro, Shinano, Japan, 21.VII.1928, S. Hirayama // Type Matsumura, "*takaosanus*".

In the original description, Matsumura erroneously read the type locality on the label, as 'Mt. Takao'.

tamahonis Matsumura, 1940a: 74 (*Ptyelus*)

Holotype ♂ – Tamoho (error for 'Tamaho'), 11-vii-1925, S. Issiki (&) S. Akasaka // det. Matsumura, "*Ptyelus tamahonis* M." // Type S. Matsumura // KGAH-44.

tokatiana Matsumura, 1942b: 94 (*Trigophora*)

Holotype ♀ – [Tokati Shintoku], 17.VIII.1917, Matsumura // Type Matsumura // "*tokatiana*".
Paratype 1♀ – same data as holotype // Paratype S. Matsumura // "*tokachiana* (sic) Mats.".

tomon Matsumura, 1940b: 51 (*Aphrophora*)

Lectotype ♂, here designated – [Tomonrei], 19/VIII,1939, S. Matsumura (&) H. Kono // Type S. Matsumura // "*A. tomon* Mats.".

Paralectotype 1♀ – [Tomonrei], Manchoukuo, S. Matsumura (&) H. Kono // Allotype Matsumura // "*Atuphora tomon* Mats.".

tonkana Matsumura, 1942b: 90 (*Tonkaephora*)

Holotype ♂ (♀ in the original designation) – Shinkairei, prov. Tonka, Manchoukuo, 9-8 1940, S. Matsumura // Paratype Matsumura // "*S. takagii*".

tsingtauana Matsumura, 1942a: 51 (*Euclovia*)

Holotype ♀ – Tsingtao, China, June-25-1937, Coll. Sub. Takagi // Type Matsumura // "*E. tsingtauana* Mats.".

tsuruana Matsumura, 1907: 110 (*Aphrophora* / *Sagophora*)

Lectotype ♀, here designated – [Taikokan], 8/16, Formosa Matsumura // "*Aphrophora tsuruana* n.sp." // Type Matsumura // "*A. tsuruana* Mats." // "*Sagophora tsuruana* Mats."

Paralectotype 1 ♀ – same data as lectotype.

Paralectotype 1 ♂ – Hoppo, 8/7.

vitis Matsumura, 1904: 42 (*Aphrophora* / *Dophora*)

Lectotype 1 ex. (abdomen lost), designated by Komatsu (1997a) – [Jozankei], 9/9 // Type Matsumura, "*A. vittata* Mats." // Lectotype *Aphrophora vitis* Mats. designated by T. Komatsu, 1997.

The species name *vittata* on the type label written by Matsumura is considered to be mistaken, based on the locality and date references.

Paralectotype 1 ♀ – [Maruyama], 8/18 // Type Matsumura, "*Dophora*" // "*A. vitis*" // Paralectotype *Aphrophora vitis* Mats. designated by T. Komatsu, 1997.

Paralectotypes 1 ♂, 1 ♀ – [Jozankei], 9/9 // Paralectotype *Aphrophora vitis* Mats. designated by T. Komatsu, 1997.

Paralectotype 1 ♂, [Jozankei], [early August] // Paralectotype *Aphrophora vitis* Mats. designated by T. Komatsu, 1997.

vittata Matsumura, 1903: 38 (*Aphrophora*)

Lectotype ♂, designated by Komatsu (1997a) – [Tokyo], [mid-August] 98 // Lectotype *Aphrophora vittata* Mats. designated by T. Komatsu, 1997.

Paralectotype 1 ♂ – [Tokyo], 7/30 // Paralectotype *Aphrophora vittata* Mats. designated by T. Komatsu, 1997.

v-pustulatus Matsumura, 1915: 175 (*Ptyelus*) <*P. abietii* var.>

Holotype ♀ – [(Mt.) Kongo-san], [late October] 1914, [(Y.) Ikuma] // Type S. Matsumura // "*v-pustulatus* M."

yagonis Matsumura, 1940a: 47 (*Mesoptylus*)

Holotype ♂ (abdomen lost) – [Mt. Fuji, Omiya-guchi], 13/VII 1930 // Type S. Matsumura // "*E. yagonis*" // KGAH-52.

yatugadakeana Matsumura, 1942b: 82 (*Sinophora*)

Holotype ♂ – [(Mt.) Yatsugatake Inakoyu], 20-VII-1939, Coll. Hitoshi Hasegawa // Type Matsumura // "*yatugadakeana* Mats." // Anufriev det. 1969, "*Sinophora hatimantiana* Mats."

Paratype 1 ♂ – [Inako, (Mt.) Yatsugatake], 18-VII-1939, Hitoshi Hasegawa // Paratype Matsumura // "*Sinophora yatugadakeana* Mats." // Anufriev det. 1969, "*Sinophora hatimantiana* Mats."

yatugadakensis Matsumura, 1934: 75 (*Aphrophora* / *Yaphora*)

Holotype ♀ – Yatsugadake (= Mt. Yatsugatake) // Type Matsumura // "*yatugadakensis* (sic) n."

yatugadakeana Matsumura, 1942b: 95 (*Yamaphora*)

Holotype ♂ – [Yatsuga] (= Mt. Yatsugatake), 23.IX.19, [(C.) Yohena] // Type Matsumura // "*yatugadakeana*" // "*Jembra yatugadakeana* M."

yatugadakeanus Matsumura, 1942b: 71 (*Peuceptyelus*)

Holotype ♀ – [(Mt.) Yatsugatake], IX 2, Matsumura // Type Matsumura // "*yatugadakeanus* (sic) M."

yayeyamanus Matsumura, 1940a: 43 (*Okiptyelus*)

Lectotype ♀, here designated – [Yaeyama], V/09 // det. Dr. Matsumura, "*Aphrophora yayeyamana*" // Type Matsumura // "*A. yayeyamana*".

Paralectotype 1 ♀ – same data as lectotype.

yohenai Matsumura, 1934: 76 (*Aphrophora*)

Holotype ♀ – [Yatsuga] (= Mt. Yatsugatake), [(C.) Yohena] // Type Matsumura // "*A. yohenai* n."

zonata Matsumura, 1904: 42 (*Aphrophora*) <*A. stictica* var.>

Lectotype ♂, here designated – [Gifu], 7/13 // *A. stictica zonata*.

Paralectotype 1 ♀ – [Kagosima], 7/29 // Paratype Matsumura // "*A. stictica*".

ACKNOWLEDGEMENTS

We thank Prof. M. Suwa and Dr. M. Ôhara at the Systematic Entomology, Faculty of Agriculture, Hokkaido University, for their generous support for this study. We are also indebted to Prof. Emerit. S. Takagi of Hokkaido University for his kind advice and invaluable information about the Matsumura Collection.

REFERENCES

- Komatsu, T. 1997a. A revision of the frog hopper genus *Aphrophora* Germar (Homoptera, Cercopoidea, Aphrophoridae) from Japan, Part 1. Jpn. J. Ent. 65: 81-96.
- Komatsu, T. 1997b. A revision of the frog hopper genus *Aphrophora* Germar (Homoptera, Cercopoidea, Aphrophoridae) from Japan, Part 2. Jpn. J. Ent. 65: 369-383.
- Komatsu, T. 1997c. A revision of the frog hopper genus *Aphrophora* Germar (Homoptera, Cercopoidea, Aphrophoridae) from Japan, Part 3. Jpn. J. Ent. 65: 502-514.
- Matsumura, S. 1903. *Monographie der Cercopiden Japans*. J. Sapporo agric. Coll. 2: 15-52.
- Matsumura, S. 1904. Additamenta zur Monographie der Cercopiden Japans, mit der Beschreibung einer neuen *Cicada*-Art. Annot. zool. japon. 5: 31-54.
- Matsumura, S. 1905. Die Hemipteren Fauna von Riukiu (Okinawa). Trans. Sapporo nat. Hist. Soc., 1: 15-38.
- Matsumura, S. 1907. Die Cicadinen Japans. Annot. zool. japon. 6: 83-116.
- Matsumura, S. 1911. Erster Beitrag zur Insecten-Fauna von Sachalin. J. Sapporo agric. Coll. 4: 1-145.
- Matsumura, S. 1915. Neue Cicadinen Koreas. Trans. Sapporo nat. Hist. Soc. 5: 154-184.
- Matsumura, S. 1934. Insects collected at the foot of Mt. Yatsugadake and its environment. Ins. matsum. 9: 60-80.
- Matsumura, S. 1936. Six new species of Homoptera collected at Okinawa by Mr. Chiro Yohena. Ins. matsum. 10: 81-84.
- Matsumura, S. 1938. Homopterous insects collected by Mr. Tadao Kano at Kotosho, Formosa. Ins. matsum. 12: 147-153.
- Matsumura, S. 1940a. New species and genera of Cercopidae in Japan, Korea and Formosa, with a list of the known species. J. Fac. Agr. Hokkaido Imp. Univ. 45: 35-82.
- Matsumura, S. 1940b. Cercopid-species from Manchuria. Ins. matsum. 14: 47-51.
- Matsumura, S. 1942a. New species and new genera of Palaearctic superfamily Cercopoidea with a tabular key to the classification (I). Ins. matsum. 16: 44-70.
- Matsumura, S. 1942b. New species and new genera of Palaearctic superfamily Cercopoidea with a tabular key to the classification (II). Ins. matsum. 16: 71-106.