

Study of Asian Strongyliini (Coleoptera, Tenebrionidae)

II. New *Strongylium* Species from Northern Thailand (Part 1)

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Abstract This is the second part of a study of the Asian Strongyliini. Twenty new species of the genus *Strongylium* from northern Thailand are described as follows: *S. doisuthepense* sp. nov., *S. taoi* sp. nov., *S. fangense* sp. nov., *S. malengthai* sp. nov., *S. soncai* sp. nov., *S. hirasawai* sp. nov., *S. tsuyukii* sp. nov., *S. phomae* sp. nov., *S. phraense* sp. nov., *S. nakpraati* sp. nov., *S. miikhonum* sp. nov., *S. doipuiense* sp. nov., *S. hideoi* sp. nov., *S. sawaiae* sp. nov., *S. roifeedaatum* sp. nov., *S. roiyonum* sp. nov., *S. lanathai* sp. nov., *S. chiangdaoense* sp. nov., *S. siisuai* sp. nov., and *S. siidemum* sp. nov.

For these 15 years, I have been studying tenebrionid beetles in northern Thailand, mainly in Chiang Mai, Chiang Rai and some other prefectures, and collected *Strongylium* materials in this area. Many other interesting specimens are submitted to me for the present study by my friends in entomology. Recently Mr. S. BEČVÁŘ, Czech Academy of Sciences, has permitted me to examine his invaluable collections and other materials under his care.

In the course of this study, I went to Europe twice, in the autumn of 1995 and the spring of 1996, to examine the types preserved in the Muséum National d'Histoire Naturelle, Paris and the Natural History Museum, London, and to find certain original descriptions of PIC, FAIRMAIRE and other authors.

In the present paper, I will describe the first 20 new species from northern Thailand. Other new species probably attaining almost to the same number, will be reported in the following part of this series.

I wish to express my heartfelt thanks to Messrs. Stanislav BEČVÁŘ (Czech Academy of Sciences), Hanmei HIRASAWA (Matsumoto City), Yoshiaki KOMIYA (Tokyo), Minoru TAO (Yokohama City), M. NISHIMURA (Akishima City), Shigeo TSUYUKI (Zushi City), Kunio KUME (Tokyo), Hideo AKIYAMA (Yokohama City), Sigeaki KONDO (Urayasu City), and Terutsune ABE (Tokyo). Deep indebtedness should be expressed to Dr. Claude GIRARD, Muséum National d'Histoire Naturelle, Paris, and Mr. Martin J. D. BRENDELL, the Natural History Museum, London, for their invaluable consideration in the course of the present study. Thanks are also due to Mr. Kaoru SAKAI in Tokyo for taking photographs inserted in this paper. Finally, I wish to express my deepest appreciation to Dr. Shun-Ichi UÉNO, Emeritus Curator of the National Science Museum

(Nat. Hist.), Tokyo, for his constant guidance on my taxonomic studies.

The abbreviation used herein are as follows: NSMT—National Science Museum (Nat. Hist.), Tokyo; MNHNP—Muséum National d'Histoire Naturelle, Paris; NHML—the Natural History Museum, London; NMP—National Museum in Prague; ZSM—Zoologische Staatssammlung München; BC—BEČVÁŘ collection.

Depositories of the holotypes of the new species to be described are given in the text.

Strongylium doisuthepense sp. nov.

(Fig. 1)

Brownish black, with mouth parts, gula, claws, etc., lighter in colour; head and pronotum feebly shining, elytra moderately and slightly vitreously shining, ventral surface gently and somewhat alutaceously shining; each surface almost glabrous. Subcylindrical.

Head subdecagonal and convex above, weakly micro-shagreened, closely and finely punctate; clypeus semicircular, flattened in basal portion, slightly divergent apicad and bent downwards in front, with fronto-clypeal sulcus fine and widely arcuate; genae rather strongly raised, with outer margins subrectangular; frons somewhat T-shaped, steeply inclined forwards; eyes large, somewhat transversely comma-shaped, strongly convex laterad, rather triangularly inlaid into head, diatone about 1/15 times the width of an eye diameter; vertex weakly, longitudinally impressed in the middle. Antennae rather filiform, reaching basal 1/6 of elytra, 7 apical segments weakly flattened and slightly dilated to each apex, ratio of the length of each segment from basal to apical: 0.85, 0.2, 1.0, 0.95, 0.85, 0.8, 0.8, 0.8, 0.75, 0.7, 0.7.

Pronotum subquadrate, 1.25 times as wide as long, widest slightly before the middle; apex slightly and widely produced apicad, rimmed, the rim feebly thickened in middle; base very slightly bisinuous, clearly bordered and boldly rimmed; sides steeply declined to gently produced lateral margins, which are finely rimmed though the rims are invisible from above; front angles rounded, hind angles rather acute; disc gently convex, weakly micro-shagreened, rather closely scattered with small punctures, which are larger than the cephalic ones. Scutellum subcordate and slightly elevated, scattered with fine punctures.

Elytra 2.4 times as long as wide, 4.8 times the length and 1.55 times the width of pronotum, very weakly widened posteriad, widest slightly before apical 1/3; dorsum strongly convex longitudinally, highest at basal 1/3; disc punctato-striate, the striae fine, the punctures in striae small and rounded, notching intervals; intervals gently convex, microscopically punctate and transversely micro-aciculate.

Male anal sternite weakly depressed in apical portion. Legs slender; male metatibiae weakly twisted, with inner faces slightly gouged in basal halves; ratios of the lengths of pro-, meso- and metatarsomeres: 0.35, 0.25, 0.25, 0.3, 1.2; 1.85, 0.8, 0.7, 0.6, 1.45; 1.9, 0.8, 0.7, 1.4.

Male genitalia fusiform, feebly curved in lateral view, 4 mm in length, 0.7 mm in width; fused lateral lobes 1.6 mm in length, finely punctate, with pointed apex.

Body length: 21.5–27.5 mm.

Holotype: ♂, Doi Suthep, Chiang Mai Pref., 1–V–1984, M. NISHIMURA leg. (NSMT). Paratypes: 3 exs., Ban Huai Po, Mae Hong Son Pref., 1,600–2,000 m alt., 8–18–V–1992, Jan HORÁK leg., 21 exs., Chiang Mai env., V–1995, no collector's name, 13 exs., 7–12–V–1996, Soppong, 1,500 m alt., Mae Hong Son Pref., S. BEČVÁR leg. (BC); 5 exs., Doi Sang, Chiang Mai Pref., 3–6–V–1990, 3 exs., Memalo, nr. Chiang Mai, 18–20–V–1990, 3 exs., nr. Chiang Mai, 3–V–1994, K. KUME leg.; 4 exs., Mt. Doi Pui, nr. Chiang Mai, 3–VI–1986, 1 ex., Doi Suthep, 1,300 m alt., 17–V–1987, 4 exs., Doi Suthep, 22–V–1987, 2 exs., Doi Suthep, 18–V–1987, 1 ex., Mt. Doi Inthanon, 1,250 m alt., Chiang Mai Pref., 2–3–V–1989, H. HIRASAWA leg.; 3 exs., Doi Suthep, 29–V–1983, Y. KOMIYA leg.; Doi Suthep, 1,100 m alt., 2 exs., 14–V–1982, 2 exs., 17–V–1982, 1 ex., 19–V–1982, 4 exs., 20–V–1982, 4 exs., 23–V–1982, 1 ex., 9–IV–1983, T. SHIMOMURA leg.; Doi Suthep, 2 exs., 3–V–1985, 2 exs., 11–V–1985, M. TAO leg.; 3 exs., Phuping Palace, Chiang Mai City, 20–21–V–1985, H. AKIYAMA leg.; 2 exs., Phuping Palace, 7–V–1984, M. NISHIMURA leg.; 2 exs., Mt. Doi Pui, V–1986, A. COTTON leg.; 2 exs., Doi Sang, 3–6–V–1990, M. ITO leg.; 2 exs., Doi Mon Angget, Chiang Mai Pref., 31–V–1990, 1 ex., Fang–Chiang Dao, Chiang Mai Pref., 22–23–V–1989, 1 ex., Doi Suthep, 11–V–1996, K. MASUMOTO leg.; 1 ex., Doi Suthep, VII–1985, 4 exs., Chiang Mai, VI–1989, N. KOYAMA leg.; 1 ex., Doi Pui, 1,500 m alt., 4–V–1980, K. KINUGASA leg.; 1 ex., Phuping Palace, 21–V–1985, M. SAWAI leg.; 1 ex., Doi Suthep, 27–IV–1989, S. TSUYUKI leg.; 2 exs., Doi Suthep, 21–V–1988, 1 ex., Doi Angkhang, Chiang Mai Pref., 1–V–1989, Manit Y. leg.; 19 exs., Doi Inthanon, Chiang Mai Pref., 16–VII–1989, 4 exs., same loc., 27–IV–1989, 7 exs., Doi Sang, 28–V–1990, 8 exs., Chiang Mai, 1988, 1 ex., Wiang Papao, Chiang Rai Pref., 2–VI–1993, no collector's name; 1 ex., Chiang Dao, no further detailed data; 1 ex., Doi Suthep, 31–V–1983, 1 ex., Doi Pui, 9–VI–1984, no collector's name; 2 exs., Wiang Papao, 15–V–1996, 2 exs., Fang, 14–V–1996, 1 ex., nr. Chiang Mai, VII–1996, native collector.

Notes. This new species resembles *S. carbonarium* GEBIEN, 1913, from Taiwan, but can be distinguished from the latter by the larger eyes, the pronotum more transverse and more clearly punctate, the elytral punctures in striae rounded and clearer, and the shorter legs. As compared with the type of *S. atricolor* PIC, 1922, from Tonkin, the present new one is differentiated by the shape of eyes, genae, pronotum, etc., and also by easily visible microscopic punctures on the elytral intervals.

Strongylium taoi sp. nov.

(Fig. 2)

Piceous, with mouth parts and major portions of ventral surface brownish; posterior portion of head and pronotum sericeously shining, elytra, legs, mesosternum ex-

cept for antero-lateral portions and abdominal sternites gently shining; almost glabrous. Rather robust.

Head somewhat rounded, rather closely and finely punctate, micro-shagreened in posterior portion; clypeus semicircular, gently inclined forwards, slightly depressed in the postero-medial portion, weakly raised on each side, haired in front, clearly bordered from frons by a widely V-shaped sulcus; genae gently raised, with subrectangular outer margins; frons boldly Y-shaped, longitudinally impressed in the postero-medial portion; eyes transversely comma-shaped, gently convex laterad, obliquely and parabolically inlaid into head, diatone about 1/4 times the width of an eye diameter. Antennae subfiliform, reaching basal 1/5 of elytra, ratio of the length of each segment from basal to apical: 0.4, 0.2, 0.8, 0.65, 0.55, 0.55, 0.55, 0.5, 0.45, 0.4, 0.4.

Pronotum subquadrate, 1.3 times as wide as long, widest slightly before the middle; apex nearly straight, widely triangularly rimmed; base feebly bisinuous, slightly more thickly rimmed than apex; sides steeply declined to lateral margins, which are weakly produced laterad in posterior portions, finely rimmed in anterior portion, the rim being visible from above; front angles obtuse, hind angles rather acute; disc gently convex, micro-shagreened, rather sparsely and irregularly scattered with small punctures, with a medial longitudinal groove and two pairs of impressions behind the middle. Scutellum subcordate, slightly convex, sparsely scattered with minute punctures.

Elytra subfusiform, nearly 3 times as long as wide, 4.8 times the length and 1.6 times the width of pronotum, weakly widened posteriad and widest at apical 1/3; dorsum longitudinally convex, highest at basal 1/3; disc punctato-striate, the striae grooved, the punctures in striae small and slightly longitudinal, very weakly notching intervals and feebly forming crenulations, with basal portions of 5th striae rather clearly impressed; intervals rather noticeably ridged, weakly micro-shagreened and scattered with microscopic punctures; humeri somewhat remarkably swollen; apices slightly, roundly produced.

Male anal sternite parabolically concave and haired; apex truncate and slightly emarginate, with each side pointed. Protibiae gently curved downwards, with ventral sides weakly gouged and haired in apical 2/3; metatibiae very slightly twisted, with inner side feebly gouged and haired in apical 3/4; ratios of the lengths of pro-, meso- and metatarsomeres: 0.6, 0.22, 0.22, 0.2, 1.2; 1.85, 0.9, 0.6, 0.4, 1.25; 2.1, 0.7, 0.35, 1.25.

Male genitalia elongated fusiform, and gently curved in lateral view, 3.8 mm in length and 0.6 mm in width, with prolonged and pointed fused lateral lobes 1.65 mm in length.

Body length: 19.5–22.5 mm.

Holotype: ♂, Doi Suthep, Chiang Mai Pref., 21-V-1985, M. TAO leg. (NSMT). Paratypes: 1 ex., Doi Sang, Chiang Mai Pref., 3~6-V-1990, K. KUME leg.; 1 ex., Doi Sang, 26-V-1990, no collector's name.

Notes. This new species somewhat resembles the preceding new one, but can be distinguished from the latter by the robuster body with mat pronotum and longitudinal

elytral punctures.

Strongylium fangense sp. nov.

(Fig. 3)

Almost wholly black with feebly brownish tinge; head and pronotum slightly shining, elytra moderately shining, ventral surface moderately shining though feebly alutaceous; almost glabrous. Elongate and subcylindrical.

Head transversely subelliptical, moderately convex above, closely punctate; clypeus rather transverse, semicircularly flattened in basal portion, weakly bent downwards in front, fronto-clypeal border widely arcuate and finely sulcate; genae rather strongly raised with rounded outer margins; frons very narrow, steeply inclined forwards; eyes large and somewhat securiform, noticeably convex laterad, broadly inlaid into head, diatone about 1/8 times the width of an eye diameter; vertex short, with an impression at the middle. Antennae nearly filiform, reaching basal 1/4 of elytra, ratio of the length of each segment from basal to apical: 0.8, 0.2, 1.4, 1.0, 0.95, 1.0, 0.98, 0.96, 0.9, 0.8, 0.89.

Pronotum 1.3 times as wide as long, widest at the middle; apex very weakly produced forwards and rimmed, the rim feebly thickened in middle; base feebly bisinuous, bordered and rimmed; sides weakly swollen laterad, steeply declined to lateral margins, which are invisible from above; front angles rounded, hind angles rather acute; disc moderately convex above, closely rugoso-punctate, weakly depressed in the postero-medial portion, with a pair of oblique impressions at basal 1/3. Scutellum slightly elongated triangular, very feebly convex, sparsely scattered with fine punctures.

Elytra 2.4 times as long as wide, 5 times the length and slightly less than 1.7 times the width of pronotum, subparallel-sided and widest at apical 1/3; dorsum rather strongly convex longitudinally and highest at basal 1/4; disc rather noticeably punctato-striate, the punctures in internal portion fine and closely set, those in antero-external portions becoming larger and forming foveae, basal portions of 1st–5th striae impressed, especially distinctly so in 5th; intervals convex, feebly micro-shagreened, somewhat transversely aciculate, scattered with microscopic punctures; humeri rather noticeably swollen; apices without peculiarities.

Male anal sternite weakly, semicircularly depressed in apical portion. Legs slender; protibiae with ventral faces weakly gouged in apical 2/3; ratios of the lengths of pro-, meso- and metatarsomeres: 0.62, 0.33, 0.31, 0.3, 1.67; 2.3, 1.05, 0.85, 0.73, 1.78; 2.78, 1.05, 0.75, 1.95.

Male genitalia short fusiform, very weakly curved in lateral view, 3.6 mm in length and 0.78 mm in width; fused lateral lobes 2 mm in length, with prolonged and very slightly thickened apices.

Body length: 18.5–23.5 mm.

Holotype: ♂, Fang District, Chiang Mai Pref., 25-V~1-VI-1993, no collector's name (NSMT). Paratypes: 3 exs., same data as for the holotype; 3 exs., Fang, 22-V-

1993, 1 ex., 14-V-1996, 12 exs., nr. Chiang Mai, VII-1996, native collector; 7 exs., Chiang Mai env., N. Thailand, V-1995, no collector's name (BC).

Notes. This new species somewhat resembles *S. longurium* FAIRMAIRE, 1903, from Tonkin, but can be distinguished from the latter by the legs almost wholly black, and the elytra with intervals weakly micro-shagreened, somewhat transversely aciculate, and scattered with microscopic punctures, and also with the punctures in striae of antero-external portions rather distinctly foveolate.

Strongylium malengthai sp. nov.

(Fig. 4)

Brownish black, with 6 apical segments of antennae, tarsi, gula, postero-lateral portions of abdominal sternites lighter in colour; head and pronotum weakly, feebly metallicly shining, pronotum strongly and somewhat vitreously so, pro- and mesosterna weakly shining, ventral surface of head, metasternum rather strongly so, abdominal sternites weakly and alutaceously so; each surface almost glabrous. Subcylindrical.

Head subdecagonal, slightly micro-shagreened and closely punctate; clypeus semicircular, inclined forwards, feebly divergent towards apex, with fronto-clypeal border arcuately sulcate; genae rather strongly raised, with rounded outer margins; frons elongated T-shaped and steeply inclined forwards, almost impunctate in anterior portion, with a longitudinal impression between eyes; eyes large and somewhat reniform, convex laterad, diameter about 1/6 the width of an eye diameter; vertex with a vague longitudinal impression medially. Antennae subfiliform, slightly thickened apicad, reaching basal 1/6 of elytra, ratio of the length of each segment from basal to apical: 0.6, 0.2, 1.1, 0.8, 0.8, 0.75, 0.6, 0.55, 0.5, 0.5, 0.55.

Pronotum almost quadrate, 1.3 times as wide as long, widest at apical 1/3; apex almost straight, narrower than base, finely rimmed on each side; base very feebly, widely bisinuous and gently reflexed, rather strongly bordered in middle; sides steeply declined to lateral margins, which are finely rimmed and visible from above; disc moderately convex, though weakly depressed in the postero-medial portion, slightly micro-shagreened and closely, irregularly punctate, the punctures often fused with one another and forming rugosities, with an oblique impression at basal 2/5 on each side. Scutellum short linguiform, almost flat, sparsely scattered with fine punctures.

Elytra 2.2 times as long as wide, 5.1 times the length and slightly less than twice the width of pronotum, feebly widened posteriad and widest at apical 1/3; dorsum longitudinally convex, highest slightly before the middle; disc with rows of punctures, those in antero-internal portion small and rather closely set, those in antero-medial and antero-lateral portions large and sparsely set, often longitudinal and forming foveae, and those in posterior portion becoming finer and almost connected with one another; intervals feebly convex in antero-internal portion, moderately so in antero-lateral, and almost flat in posterior portion, microscopically punctate and transversely micro-acicu-

late; humeri rather noticeably swollen; apices not modified.

Male anal sternite weakly depressed in apical portion. Legs slender; male metatibiae very weakly twisted, with inner faces slightly gouged widely in middle; ratios of the lengths of pro-, meso- and metatarsomeres: 0.4, 0.25, 0.25, 0.23, 1.2; 1.75, 0.75, 0.6, 0.45, 1.25; 1.9, 0.8, 0.7, 1.3.

Male genitalia fusiform, 3 mm in length and 0.6 mm in width; fused lateral lobes 0.4 mm in length, gently pointed at apex, with dorsal surface finely punctate.

Body length: 18.5–22.5 mm.

Holotype: ♂, Fang Dist., Chiang Mai Pref., 25-V~1-VI-1993, no collector's name (NSMT). Paratypes: 11 exs., same data as for the holotype; 3 exs., Fang, 22-V-1993, 1 ex., 14-V-1996, 7 exs., Wiang Papao, Chiang Rai Pref., 2-VI-1993, 5 exs., nr. Chiang Mai, VII-1996, native collector; 13 exs., Fang Dist., V-1992, native collector, 10 exs., Chiang Mai env., V-1995, no collector's name (BC).

Notes. This new species somewhat resembles *S. alishanum* MASUMOTO, 1981, from Taiwan, but can be distinguished from the latter by the wider pronotum with apex not ridged medially, the elytra with rows of punctures, which are larger and somewhat foveolate in antero-medial and antero-lateral portions. The present species also somewhat resembles *S. subaeneum* PIC, 1917, from Yunnan, but can be differentiated from the latter by the larger body with pronotal punctures larger and often fused with one another, and the coarser elytral punctures.

Strongylium soncai sp. nov.

(Fig. 5)

Brownish black, with antennae, mouth parts, gula, mesosternum, legs, etc., more or less lighter in colour; head and pronotum weakly, somewhat sericeously shining, scutellum and elytra dark copper-coloured or brassy and rather distinctly, metallicly shining, ventral surface somewhat alutaceous; each surface almost glabrous. Elongate and subcylindrical.

Head subdecagonal, feebly micro-shagreened, rather closely and finely punctate; clypeus rather semicircular and widely flattened in basal portion, gently bent downwards in front, with fronto-clypeal border widely arcuate and finely sulcate; genae oblique, with outer margins rather strongly and roundly raised; frons somewhat T-shaped, gently inclined forwards; eyes very large and somewhat reniform, strongly convex laterad, widely inlaid into head, diameter 1/7 times the width of an eye diameter; vertex with a longitudinal and impunctate impression medially. Antennae subfiliform, reaching basal 1/4 of elytra, ratio of the length of each segment from basal to apical: 0.85, 0.33, 1.6, 1.15, 1.25, 1.2, 1.05, 0.85, 0.8, 0.8, 0.9.

Pronotum rather quadrate, 1.23 times as wide as long, widest at apical 2/5; apex weakly produced forwards, feebly bordered on each side; base slightly bisinuate, wider than apex, rather boldly ridged; sides rather steeply declined to lateral margins, which are produced laterad, feebly sinuous before base, and finely rimmed; front angles

rounded, hind angles angulate in dorsal view; disc gently convex, weakly micro-shagreened, rather closely scattered with fine punctures, with a fine longitudinal impunctate area medially. Scutellum subcordate, weakly ridged postero-medially, sparsely scattered with minute punctures.

Elytra 2.4 times as long as wide, 5.2 times the length and 1.7 times the width of pronotum, slightly widened posteriad, widest at apical 1/3; dorsum strongly convex longitudinally, very faintly flattened medially; disc punctato-striate, the striae very fine and often vanished, the punctures in striae small and somewhat longitudinal, those in lateral portion becoming larger and coarser, often forming longitudinal foveae, and those in posterior portions becoming sparser and finer; intervals very feebly micro-shagreened, often transversely micro-aciculate, and sparsely scattered with microscopic punctures, those in inner portion feebly convex, those in lateral portion gently so, and those in posterior portion almost flattened and smooth; humeri roundly swollen; apices rounded and very slightly acuminate.

Male anal sternite very weakly depressed in apical portion. Legs slender; ratios of the lengths of pro-, meso- and metatarsomeres: 0.55, 0.35, 0.45, 0.4, 1.5; 2.25, 1.2, 1.0, 0.75, 1.7; 2.8, 1.35, 0.95, 2.0.

Male genitalia elongated fusiform, gently curved in lateral view, 3 mm in length and 0.6 mm in width; fused lateral lobes 1.4 mm in length, with apex slightly prolonged and acutely pointed.

Body length: 20.5–21.5 mm.

Holotype: ♂, Fang Dist., Chiang Mai Pref., 25-V~1-VI-1993, no collector's name (NSMT). Paratypes: 1 ex., Wiang Papao, 2-VI-1993, no collector's name; 9 exs., Hte. Birmanie, Mines des Rubis, 1,200–2,300 m alt., DOHERTY leg., 1880 (MNHNP); 4 exs., Ruby Mines, Burma, 5,500–7,500 ft. alt., 1904–150, 6 exs., Ruby Mines, Birmah, DOHERTY leg., 5 exs., Ruby-mines, Upper Burmah, 5–7,000 ft. alt. DOHERTY leg., 2 exs., NE Burma, Kambaiti, 7,000 ft. alt., 22-VI-1934, R. MALAISE leg., 1 ex., 4~8-VI-1934, same locality and collector as for the preceding, 1 ex., Bhamo, Burma, Thos. SELKIRK leg., 1910–267 (NHML).

Notes. This new species resembles the preceding, *S. malengthai* sp. nov., but can be distinguished from the latter by the narrower body with head and pronotum more finely punctate, elytra more strongly shining with punctures less distinctly foveolate, and slenderer legs.

Although slight difference can be observed in the body shape between Burmese and Thai populations, it might be due to local variation.

Strongylium hirasawai sp. nov.

(Fig. 6)

Black with a feeble iron-grayish tinge, antennae, mouth parts, gula, tarsi, etc., more or less lighter in colour; head and pronotum weakly shining, elytra moderately and metallically so, ventral surface weakly and alutaceously shining except for major

part of metasternum, which is moderately so; each surface almost glabrous. Elongate and subcylindrical.

Head subdecagonal, very weakly micro-shagreened, closely and finely punctate, each puncture with a microscopic bent hair; clypeus semicircular and widely flattened in basal portion, bent downwards in apical portion, which is widely triangular, with fronto-clypeal border slightly arcuate and finely sulcate; genae moderately raised, with outer margins rounded; frons somewhat T-shaped; eyes large, rather strongly convex laterad, obliquely inlaid into head, diatone 1/6 times the width of an eye diameter; vertex longitudinally impunctate medially, with a subrhombic impression between posterior portions of eyes. Antennae subfiliform, reaching basal 1/5 of elytra, ratio of the length of each segment from basal to apical: 0.8, 0.25, 1.5, 1.1, 1.2, 1.15, 0.85, 0.8, 0.75, 0.75, 0.85.

Pronotum subquadrate, 1.3 times as wide as long, widest at apical 2/5; apex almost straight, finely bordered and rimmed; base slightly bisinuate, wider than base, bordered and ridged, the ridge shining, finely punctate, and feebly thickened in medial portion; sides steeply declined to lateral margins, which are gently produced laterad, sinuous before base, and finely ridged, the ridge almost invisible from above; front angles rounded, hind angles rather acute; disc moderately convex with an oblique impression at basal 1/3 on each side, very weakly micro-shagreened, closely and irregularly punctate, the punctures larger than those on head, each with a microscopic bent hair. Scutellum triangular, feebly convex above, weakly micro-shagreened, punctato-aciculate on each side.

Elytra 2.3 times as long as wide, 4.8 times the length and 1.6 times the width of pronotum, subparallel-sided though weakly widened posteriad, widest at apical 2/5; dorsum strongly convex longitudinally, highest at basal 1/3; disc finely punctato-striate, the punctures in striae small, somewhat longitudinal and rather closely set, those in apical portion becoming smaller; intervals in basal portion feebly raised, weakly micro-shagreened, scattered with microscopic punctures, and rather transversely, sparsely aciculate, those in posterior portion almost flat and smooth, only scattered with more microscopic punctures; humeri bordered by basal portion of impressed 5th striae and gently swollen; apices without peculiarity.

Male anal sternite weakly depressed and haired in apical portion. Legs slender; male protibiae with ventral faces weakly gouged and haired in apical halves; male mesotibiae with inner faces very weakly gouged and haired in apical halves; male metatibiae with inner faces weakly gouged and haired in basal 1/3 and again very weakly so in apical 1/3; ratios of the lengths of pro-, meso- and metatarsomeres: 0.6, 0.3, 0.3, 0.25, 1.4; 1.55, 1.0, 0.8, 0.65, 1.65; 2.7, 1.2, 0.7, 1.65.

Male genitalia elongated fusiform, and almost straight in lateral view, 3.7 mm in length and 0.7 mm in width; fused lateral lobes 1.6 mm in length, with weakly prolonged, acute apex.

Body length: 22 mm.

Holotype: ♂, Mt. Doi Inthanon, 1,250 m alt., Chiang Mai Pref., 2~3-V-1989, H.

HIRASAWA leg. (NSMT). Paratypes: 1 ex., Chiang Mai env., V-1995, no collector's name (BC); 1 ex., Doi Suthep, VII-1985, N. KOYAMA leg.

Notes. The present new species resembles *S. malengthai* sp. nov., but can be distinguished from the latter by the larger and more elongate body, with strial punctures on the elytra obviously finer and closer, and slenderer male genitalia.

Strongylium tsuyukii sp. nov.

(Fig. 7)

Brownish black, dorsal surface and some parts of ventral surface with golden coppery tinge, ventral surfaces of head and legs more or less lighter in colour; head and pronotum feebly shining, elytra strongly and metallically so, major portions of ventral surface alutaceous, central part of metasternum strongly and somewhat vitreously shining; dorsal surface almost glabrous, ventral surface clothed with pale bent hairs. Elongate and convex longitudinally.

Head subdecagonal, closely punctate, the punctures sometimes fused with one another; clypeus semicircular, rather strongly bent downwards in front, with fronto-clypeal border arcuately and finely sulcate; genae oblique, rather strongly raised, with obtuse outer margins; frons finely T-shaped, rather steeply inclined forwards, with area between posterior portions of eyes impressed in rhombic shape, each side of the impression slightly ridged; eyes medium-sized, somewhat securiform, moderately convex laterad, slightly obliquely inlaid into head, diatone about 1/7 times the width of an eye diameter. Antennae reaching basal 1/8 of elytra, 5 apical segments gently flattened and thickened towards each apex, ratio of the length of each segment from basal to apical: 1.0, 0.25, 1.25, 1.25, 1.13, 1.1, 1.0, 0.84, 0.72, 0.6, 0.6.

Pronotum quadrate, slightly longer than wide; apex very slightly arcuate posteriorly, rather noticeably, widely triangularly rimmed; base slightly wider than apex, very weakly bisinuous and rimmed; sides rather steeply declined to lateral margins, which are weakly ridged and invisible from above; front angles subrectangular, hind angles slightly acute in dorsal view; disc gently convex, irregularly and coarsely punctate, the punctures often fused with one another, with a longitudinal groove in the middle, and also with an impression behind the middle on each side. Scutellum linguiform, impressed medially, and minutely rugoso-punctate.

Elytra elongate, about 2.4 times as long as wide, 5 times the length and 1.7 times the width of pronotum, widest at apical 1/3; dorsum distinctly tri-undulate, with a pair of subconical swellings at basal 1/8, which is the highest; disc punctato-striate, the striae in inner portion grooved, those in outer portion often disappearing, the strial punctures in inner portion small and closely set, those in lateral portion becoming larger and coarser, often fused with one another, forming large longitudinal foveae; intervals in inner portion gently convex, those in lateral portion strongly ridged, basal portion of 3rd rather distinctly so; humeri feebly swollen; apices slightly dehiscent.

Male anal sternite semicircularly concave and pubescent, shallowly emarginate at

apex. Legs slender; male protibiae with ventral sides weakly gouged in apical 2/3 and haired; male metatibiae with inner margins weakly twisted, feebly gouged in basal 3/4; ratios of the lengths of pro-, meso- and metatarsomeres: 0.31, 0.2, 0.22, 0.24, 1.2; 1.84, 0.78, 0.64, 0.55, 1.47; 1.82, 0.69, 0.54, 1.39.

Male genitalia slender, gradually thinned apicad, and gently curved in lateral view, 3.7 mm in length and 0.65 mm in width, slightly constricted between basal piece and fused lateral lobes, whose apices are sharply pointed.

Body length: 16–23 mm.

Holotype: ♂, near Chiang Mai, 1,300 m, 17–V–1987, H. HIRASAWA leg. (NSMT). Paratypes: 2 exs., same data as for the holotype; 2 exs., Ban Huai Po, 800–1,600 m alt., Mae Hong Son Pref., 1–15–V–1991, S. BILY leg. (coll. PICKA); 1 ex., Ban Huai Po, 1,600–2,000 m alt., 30–IV–4–V–1991, J. HORÁK leg. (BC); 2 exs., Mt. Doi Pui, near Chiang Mai, V–1986, A. COTTON leg.; 5 exs., Chiang Mai, 1988, native collector; 1 ex., Doi Suthep, Chiang Mai, 27–IV–1980, S. TSUYUKI leg.; 1 ex., Doi Suthep, 24–V–1985, M. Tao leg.

Notes. This new species resembles *S. sinuatipenne* MIWA, 1939, from Taiwan, but can be distinguished from the latter by the slightly robuster body with golden copper-coloured dorsal surface, the pronotum more coarsely punctate with a medial groove and a pair of impressions, and the elytra more strongly undulate with a pair of swellings at basal 1/8, and punctures in the striae coarser in the lateral portions.

Strongylium phomae sp. nov.

(Fig. 8)

Blackish brown, with mouth parts, gula, femora and tibiae except for their apical portions, etc., lighter in colour; dorsal surface feebly, alutaceously shining and almost glabrous, ventral surface gently shining and clothed with microscopic hairs. Rather elongate and subcylindrical.

Head subrhombic, slightly micro-shagreened, closely rugoso-punctate, each puncture with a microscopic bent hair; clypeus quadrate, widely flattened in basal portion, weakly bent downwards and truncate in front, with fronto-clypeal border widely triangular and finely impressed; genae obliquely raised, with obtuse outer margins; frons finely Y-shaped; eyes large and close to each other, strongly convex laterad and broadly inlaid into head, diatone about 1/7 times the width of an eye diameter; vertex with a rather large impression medially. Antennae subfiliform, reaching basal 1/5, ratio of the length of each segment from basal to apical: 0.5, 0.2, 0.8, 0.55, 0.55, 0.5, 0.45, 0.4, 0.35, 0.3, 0.4.

Pronotum quadrate, 1.3 times as wide as long, widest at the middle; apex almost straight and rimmed, the rim slightly thickened medially; base feebly bisinuuous, clearly bordered and boldly rimmed; sides steeply declined to lateral margins, which are produced laterad and finely rimmed, though the rims are hardly visible from above; front angles rounded, hind angles acute; disc gently convex with a shallow, longitudinal me-

dial groove, micro-shagreened and closely rugoso-punctate, each puncture with a microscopic bent hair. Scutellum sublinguiform, rather closely and finely rugoso-punctate, with a longitudinal impunctate part.

Elytra elongate, 2.3 times as long as wide, 4.5 times the length and 1.5 times the width of pronotum, subparallel-sided though feebly widened posteriad, widest at apical 1/3; dorsum strongly convex longitudinally, highest slightly before the middle; disc micro-shagreened, scattered with microscopic punctures and finely, transversely wrinkled, punctato-striate, the striae fine and often interrupted, the punctures coalesced with one another and forming short longitudinal grooves, those in lateral portion becoming coarser and foveolate, those in posterior portion finer; intervals strongly convex in antero-lateral portion, becoming flat apicad; base of elytra bisinuously raised due to strongly impressed basal portions of 1st to 5th striae; humeri moderately raised; apices slightly dehiscent.

Male anal sternite without peculiarities. Legs simple in shape; ratios of the lengths of pro-, meso- and metatarsomeres: 0.35, 0.25, 0.26, 0.27, 1.2; 1.35, 0.65, 0.55, 0.45, 1.3; 1.65, 0.65, 0.5, 1.3.

Male genitalia elongated fusiform, 2.7 mm in length and 0.4 mm in width; fused lateral lobes 1.1 mm in length and sharply nib-shaped.

Body length: 16 mm.

Holotype: ♂, Fang Dist., Chiang Mai Pref., 25-V~1-VI-1993, no collector's name (NSMT). Paratypes: 13 exs., Soppong, 1,500 m alt., Mae Hong Son Pref., 7~12-V-1996, 5 exs., Doi Pui, 1,600 m alt., 8-V-1996, S. BEČVÁŘ leg., 5 exs., Doi Pui, 2~6-V-1996, Vit KUBÁN leg., 1 ex., Fang env., V-1992, native collector, 2 exs., Doi Pui, 2~6-V-1996, J. HORÁK leg. (BC); 2 exs., same data as for the holotype; 1 ex., Fang Dist., 22-V-1993, no collector's name; 1 ex., Mt. Doi Pui, 3-V-1980, S. TSUYUKI leg.; Doi Suthep, 3 exs., 11-V-1996, 1 ex., 15-V-1996, 1 ex., 19-V-1996, K. MASUMOTO leg.

Notes. This new species belongs to a group widespread from Yunnan to northern India. I will deal with the other species in near future.

Strongylium phraense sp. nov.

(Fig. 9)

Brownish black, dorsal surface slightly with dark bluish tinge, head and legs weakly, metallicly shining, pronotum and elytra feebly, somewhat alutaceously shining, ventral surface dark bluish and metallicly shining; dorsal surface almost glabrous though the apical portion of clypeus is rather densely clothed with long bent hairs, ventral surface clothed with short and fine hairs. Oblong-ovate and strongly convex above.

Head subdecagonal, very weakly micro-shagreened, closely and finely punctate; clypeus transverse, weakly bent downwards, fronto-clypeal border almost straight and finely sulcate; genae obliquely raised, with obtuse outer margins; frons somewhat

finely T-shaped, gently inclined forwards; eyes large and transversely comma-shaped, moderately convex laterad and broadly inlaid into head, diameter about 1/6 the width of an eye diameter. Antennae slightly thickened apicad, reaching basal 1/6 of elytra, ratio of the length of each segment from basal to apical: 0.57, 0.2, 0.69, 0.57, 0.46, 0.43, 0.41, 0.39, 0.35, 0.32, 0.38.

Pronotum quadrate, 1.3 times as wide as long, widest slightly before the middle; apex almost straight and rimmed, the rim rather noticeably thickened in middle; base very feebly bisinuous, slightly wider than apex, rimmed, the rim gently thickened in middle; sides steeply declined to lateral margins, whose basal halves are subparallel and apical halves are rounded, ridged, apical halves of the ridges being visible from above; front angles rounded, hind angles subrectangular; disc gently convex and longitudinally grooved medially, with a pair of impressions at base, weakly micro-shagreened, rather closely, strongly punctate, the punctures sometimes fused with one another. Scutellum subcordate, flattened, micro-shagreened and sparsely scattered with minute punctures.

Elytra oblong, 1.9 times as long as wide, 3.5 times the length and 1.3 times the width of pronotum, widest at apical 1/3, though almost parallel-sided; disc strongly convex, highest at basal 1/3, with a pair of low swellings at basal 1/7; disc punctostriate, the striae very shallow, punctures in inner portion small, almost rounded and rather closely set, those in medial and lateral portions becoming larger and sparsely set, often forming longitudinal foveae; intervals micro-shagreened, scattered with microscopic punctures, gently convex in inner portion, remarkably raised in medial and lateral portions; 1st to 3rd intervals distinctly flattened in apical 1/4, since the 4th and 6th are ridged; humeri moderately swollen; apices slightly truncate and emarginate, with 1st interval feebly produced posteriad.

Male anal sternite broadly, semicircularly concave in apical 4/5, with truncate apex. Male protibiae with ventral faces very weakly gouged in middle; male metatibiae rather distinctly twisted, with inner margins gouged in basal 2/5 and ridged in apical halves; ratios of the lengths of pro-, meso- and metatarsomeres: 0.4, 0.2, 0.22, 0.2, 1.2; 2.8, 1.23, 0.97, 0.64, 1.61; 2.23, 0.79, 0.51, 1.57.

Male genitalia elongated fusiform, 2.3 mm in length and 0.4 mm in width; fused lateral lobes somewhat nib-shaped, 1 mm in length, with a fine longitudinal impression in apical 1/4.

Body length: 12 mm.

Holotype: ♂, Wieng Ko Sai National Park, Phrae Pref., N. Thailand, 18-V-1985, M. SAWAI leg. (NSMT). Paratypes: 6 exs., Ban Van Eua, Vientiane, Laos, 15-VI-1969, 1 ex., 15-VI-1967, 1 ex., 16-VI-1969, 1 ex., 14-VI-1965, J. RONDON leg.; Phou Khao Khouai, Vientiane, 1 ex., 15-VI-1966, 1 ex., 8-VI-1965, J. RONDON leg.; 1 ex., Sayabouri, Laos, 18-VIII-1966, J. RONDON leg.; 1 ex., Wapi, Sud Laos, 30-VI-1967, J. RONDON leg.; 1 ex., Packadine, Laos, 13-V-1966, J. RONDON leg.; 1 ex., Vientiane, VII-1963, A. BAUDON leg. (MNHNP); 1 ex., Wiang Ko Sai, 19-V-1985, Y. KOMIYA leg.; 1 ex., Doi Suthep, 1,100 m alt., 16-VI-1983, T. SHIMOMURA leg.; 1 ex., Soppong-

Pai, 1,800 m alt., 1~8-V-1993, PACHOLATKO & DEMBICKY leg. (coll. BREMER); 2 exs., Chiang Dao env., 17~19-VI-1995, M. SNIZEK leg. (BC).

Notes. This new species somewhat resembles *S. azuripes* ARDOIN, 1976, from Laos, but can be distinguished from the latter by the elytra with a pair of swellings in basal 1/7, 4th intervals distinctly raised in the posterior portions, the area between the ridges flattened, and the modified elytral apices.

Strongylium nakpraati sp. nov.

(Fig. 10)

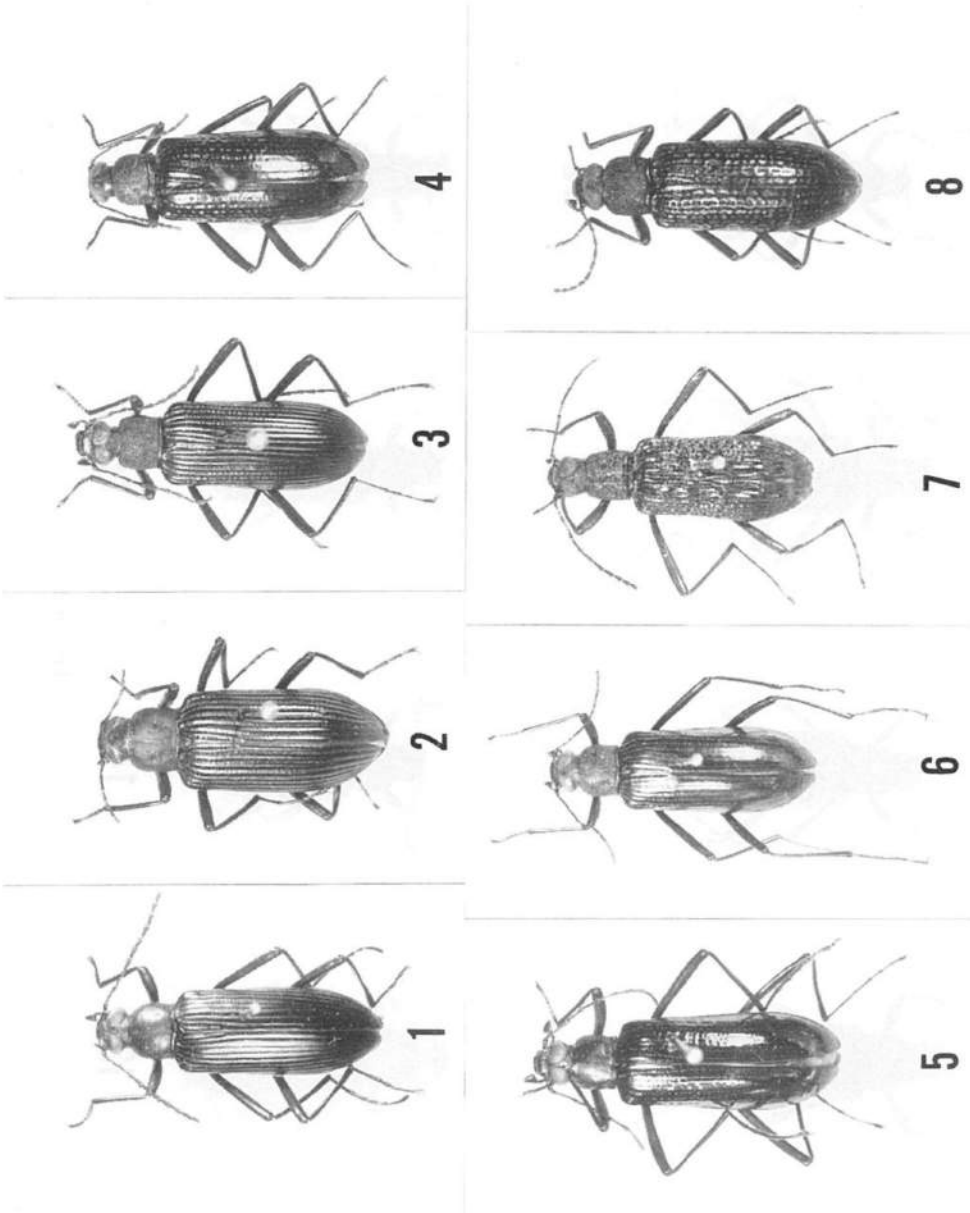
Piceous, apical portion of head, ventral surface and legs with dark bluish tinge; dorsal surface gently shining and almost glabrous, ventral surface feebly, somewhat alutaceously shining, metasternum and abdomen microscopically haired. Oblong-ovate and rather strongly convex above.

Head subdecagonal, closely punctate, the punctures often fused with one another and each with a microscopic bent hair; clypeus somewhat transversely hexagonal, bent downwards and truncate in front, bordered from frons by nearly straight fine sulcus; genae gently raised, with obtuse outer margins; frons wide, moderately inclined forwards, with a longitudinal impunctate part between eyes; eyes medium-sized, roundly convex laterad, gently inlaid into head and somewhat securiform, diatone about the width of an eye diameter. Antennae feebly thickened and weakly flattened apicad, reaching base of elytra, ratio of the length of each segment from basal to apical: 0.6, 0.2, 0.8, 0.7, 0.55, 0.45, 0.45, 0.4, 0.35, 0.3, 0.3.

Pronotum quadrate, 1.25 times as wide as long, widest both before and behind the middle; apex almost straight and rimmed, the rim gently thickened in middle; base very slightly sinuous on each side, rimmed, the rim weakly thickened in middle; sides produced laterad, though very slightly constricted in the middle, steeply declined to lateral margins, which are finely rimmed, the rim barely visible from above; front angles rounded, hind angles nearly rectangular in dorsal view; disc gently convex, with a shallow, somewhat I-shaped groove in the medial portion, a pair of vague rounded impressions before the middle, and also with a pair of oblique ones at the base, closely and coarsely punctate, the punctures often fused with one another, each with a microscopic bent hair. Scutellum sublinguiform, weakly elevated, rather closely scattered with small punctures.

Elytra 1.9 times as long as wide, about 3.8 times the length and 1.6 times the width of pronotum, widest slightly behind the middle; dorsum strongly convex, highest at basal 1/8; disc with rows of large and longitudinal foveae, which are rather irregularly set, each with an interrupted punctato-stria in the bottom; intervals ridged, irregularly and transversely united with one another, often forming carinae, weakly microshagreened, and scattered with microscopic punctures; 3rd intervals distinctly ridged in basal portion; humeri and apices not modified.

Male anal sternite semicircularly concave and pubescent in apical 3/4, with apex



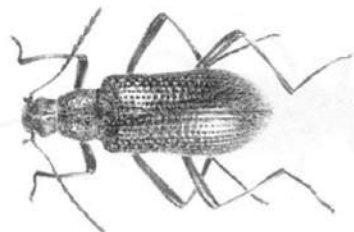
Figs. 1-8.



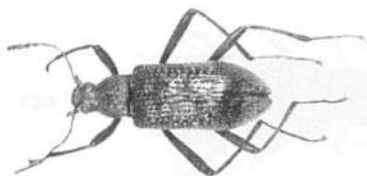
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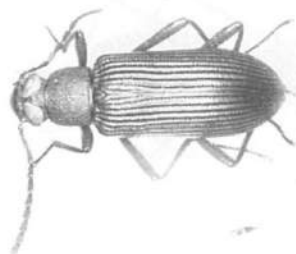
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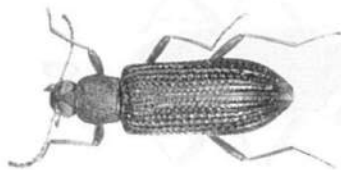
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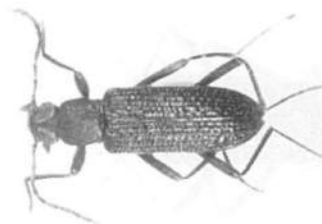
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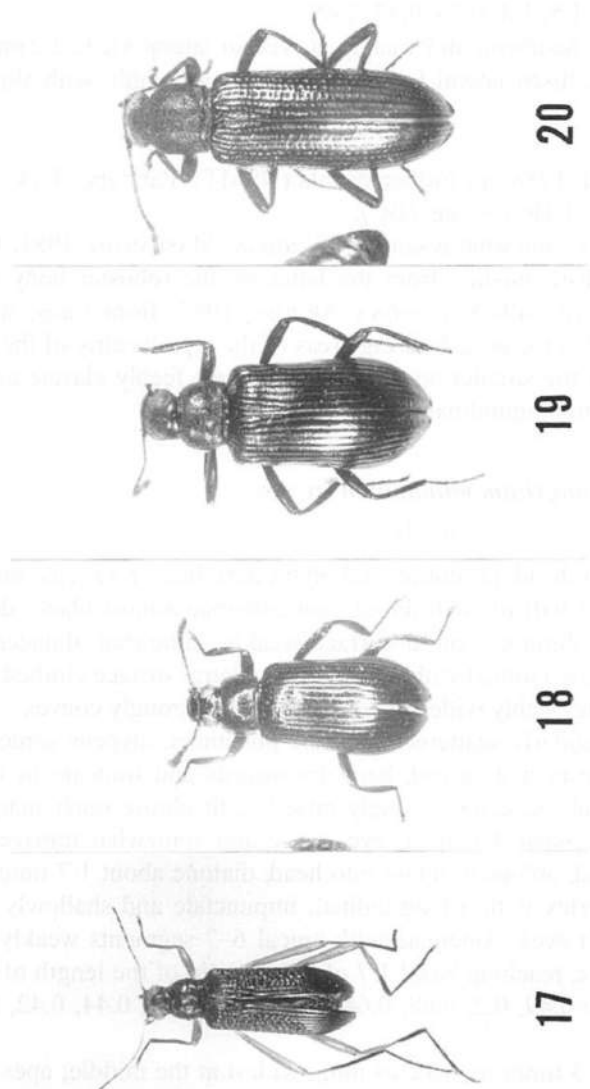


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Figs. 9-16.



Figs. 17-20.

Explanation of the Figures.

- Figs. 1-8 (on p. 351). Habitus of *Strongylium* spp. — 1, *S. doitsuhepense* sp. nov., holotype, ♂; 2, *S. taii* sp. nov., holotype, ♂; 3, *S. fangense* sp. nov., holotype, ♂; 4, *S. malengthai* sp. nov., holotype, ♂; 5, *S. soncai* sp. nov., holotype, ♂; 6, *S. hirasawai* sp. nov., holotype, ♂; 7, *S. tsuyukii* sp. nov., holotype, ♂; 8, *S. phomae* sp. nov., holotype, ♂.
- Figs. 9-16 (on p. 352). Habitus of *Strongylium* spp. — 9, *S. phraense* sp. nov., holotype, ♂; 10, *S. nakpraati* sp. nov., holotype, ♂; 11, *S. miikhonum* sp. nov., holotype, ♂; 12, *S. doipuiense* sp. nov., holotype, ♂; 13, *S. hideai* sp. nov., holotype, ♂; 14, *S. sawatae* sp. nov., holotype, ♂; 15, *S. roifeedaatum* sp. nov., holotype, ♂; 16, *S. roiyonum* sp. nov., holotype, ♂.
- Figs. 17-20 (on p. 353). Habitus of *Strongylium* spp. — 17, *S. lanathai* sp. nov., holotype, ♂; 18, *S. chiangdaoense* sp. nov., holotype, ♀; 19, *S. si-istai* sp. nov., holotype, ♀; 20, *S. siidemum* sp. nov., holotype, ♂.

truncate and roundly produced on each side. Male femora flattened, thickened apicad; male protibiae with ventral faces gouged and haired widely in middle, thickened and tufted at apices; male metatibiae weakly twisted, with ventral faces weakly gouged and haired in apical 3/4; ratios of the lengths of pro-, meso- and metatarsomeres: 0.3, 0.2, 0.2, 0.2, 1.2; 1.4, 0.6, 0.5, 0.4, 1.5; 1.3, 0.55, 0.45, 1.45.

Male genitalia elongated fusiform, and weakly curved in lateral view, 2.2 mm in length and 0.45 mm in width; fused lateral lobes about 1 mm in length, with slightly prolonged apices.

Body length: ca. 10 mm.

Holotype: ♂, Chiang Mai, 1988, no further details (NSMT). Paratype: 1 ex., Doi Suthep-Pui, 13~23-IV-1991, J. HORÁK leg. (BC).

Notes. This new species somewhat resembles *S. zoltani* MASUMOTO, 1981, from central Taiwan, but can be distinguished from the latter by the robuster body with glabrous dorsum. As compared with *S. azuripes* ARDOIN, 1967, from Laos, which might be a relative distributed in the neighbouring areas of the type locality of the new species, it is distinguished by the smaller and darker body with feebly clavate antennae, and the elytra covered with longitudinal foveae.

Strongylium miikhonum sp. nov.

(Fig. 11)

Dark reddish brown, with head, pronotum and elytra dark blue, fore legs, middle and hind legs except for basal half of each femur, and antennae almost black; dorsal surface somewhat vitreously shining, ventral surface weakly somewhat alutaceously shining; dorsal surface distinctly clothed with pilose hairs, ventral surface clothed with fine bent hairs. Rather elongate, feebly widened posteriad, fairly strongly convex.

Head subdecaagonal, irregularly scattered with fine punctures; clypeus somewhat parabolical, rather strongly projected apicad, bent downwards and truncate in front, with arcuate fronto-clypeal sulcus; genae strongly raised, with obtuse outer margins; frons rather narrow and somewhat T-shaped; eyes large and somewhat transversely comma-shaped, convex laterad, obliquely inlaid into head, diatone about 1/7 times the width of an eye diameter; vertex with a longitudinal, impunctate and shallowly concave area posteriorly between eyes. Antennae with apical 6-7 segments weakly flattened and dilated to each apex, reaching basal 1/7 of elytra, ratio of the length of each segment from basal to apical: 0.49, 0.2, 0.68, 0.64, 0.56, 0.48, 0.46, 0.44, 0.42, 0.39, 0.38.

Pronotum trapezoidal, 1.3 times as wide as long, widest at the middle; apex sub-linear, widely triangularly bordered and weakly ridged; base obviously wider than apex, feebly bisinuuous, straightly bordered and weakly ridged; sides gently produced laterad, steeply declined to finely ridged lateral margins, which are invisible from above; front angles rounded, hind angles rather acute in dorsal view; disc gently convex with a longitudinal median impression, irregularly scattered with punctures, each

puncture with a bent pilose hair. Scutellum triangular, sparsely scattered with small punctures.

Elytra twice as long as wide, 4.6 times the length and 1.7 times the width of pronotum, widest at apical 2/7; dorsum rather strongly convex, highest at basal 2/7; disc with rows of small punctures, becoming larger and coarser laterad and forming foveae in lateral portion; intervals gently convex, often feebly, transversely wrinkled in antero-lateral portion, scattered with minute punctures, each with a rather erect hair; humeri and apices not modified.

Male anal sternite semicircularly concave, with apex truncate, widely and feebly emarginate; male protibiae with inner sides feebly gouged widely in middle; male metatibiae remarkably twisted, with inner sides widely gouged in middle; ratios of the lengths of pro-, meso- and metatarsomeres: 0.29, 0.21, 0.25, 0.26, 1.2; 1.61, 0.7, 0.59, 0.43, 1.37; 1.57, 0.67, 0.53, 1.39.

Male genitalia elongated fusiform, 2.65 mm in length and 0.5 mm in width; fused lateral lobes 1/3 times the total length of genitalia, with feebly prolonged apices.

Body length: 12–15.5 mm.

Holotype: ♂, near Chiang Mai, NW Thailand, 23–IV–1985, M. TAO leg. (NSMT). Paratypes: 1 ex., Samoeng Dist., Chiang Mai Pref., 3–V–1994, K. MASUMOTO leg.; 1 ex., 14–V–1982, 1 ex., 19–V–1982, 1 ex., 20–V–1982, Doi Suthep, Chiang Mai Pref., T. SHIMOMURA leg.; 1 ex., Doi Suthep, 11–V–1986, M. TAO leg.; 1 ex., Doi Suthep, 1–V–1980, K. KINUGASA leg.; 1 ex., Doi Pui, Chiang Mai Pref., 23–V–1982, T. SHIMOMURA leg.; 1 ex., Doi Pui, V–1985, A. COTTON leg.; 1 ex., Doi Pui, 2–VII–1984, no collector's name; 1 ex., Phuping Palace, Chiang Mai Pref., 31–V–1983, Y. KOMIYA leg.; 2 exs., Ban Huai Po, Mae Hong Son Pref., 30–IV–4–V–1991, 1 ex., 17–23–V–1991, L. DEMBICKY leg. (Nat. Hist. Mus. Viden).

Notes. The present new species resembles *S. albopilosum* GEBIEN, 1913, from Taiwan, but can be distinguished from the latter by the more stout body covered with harder and shorter hairs, the head with larger eyes and slenderer antennae, the pronotum scattered with sparser and slightly coarser punctures, the elytra with rows of stronger punctures, which are foveolate in the antero-lateral portions, and the intervals scattered with finer punctures. The known species distributed in the neighbouring area is *S. laosense* PIC, 1917, from Laos. Its holotype is a female, but a comparison with it proves that the present species can be distinguished by the slenderer bluish body with larger eyes, stronger pronotal punctation and clearer elytral punctation.

Strongylium doipuiense sp. nov.

(Fig. 12)

Piceous, head feebly greenish and metallicly shining, pronotum and scutellum slightly, vitreously shining, pronotum with apex, base and discal punctures golden greenish, elytra vitreously shining and clothed with fine, rather long hairs, those in postero-lateral portions noticeably pale golden in apical halves, major portions of ven-

tral surface dark blue and gently shining, legs dark blue and partly greenish. Oblong and strongly convex, very slightly widened posteriad.

Head subdecagonal, closely punctate; clypeus semicircular, bent downwards and truncate in front, fronto-clypeal border widely arcuate, finely sulcate; genae roundly produced laterad and moderately raised; frons somewhat T-shaped, gently inclined forwards; eyes medium-sized and somewhat transversely comma-shaped, moderately convex laterad, obliquely inlaid into head, diatone about 1/4 times the width of an eye diameter; vertex longitudinally impressed in middle. Antennae reaching basal 1/5 of elytra, 7 apical segments gently flattened, dilated to each apex, ratio of the length of each segment from basal to apical: 0.6, 0.2, 0.99, 0.86, 0.75, 0.73, 0.68, 0.59, 0.51, 0.49, 0.44.

Pronotum subquadrate, 1.2 times as wide as long, widest slightly before the middle; apex almost straight and rimmed, the rim feebly thickened in middle; base wider than apex, slightly bisinuous, bordered and more thickly rimmed than apex; sides gently produced laterad, steeply declined to lateral margins, which are barely bordered and invisible from above; front angles rounded, hind angles angulate in dorsal view; disc gently convex, impressed longitudinally in the middle, and also impressed slightly behind the middle on each side, rather closely, coarsely punctate, the punctures with fine bent hairs and sometimes fused with one another. Scutellum linguiform, finely impressed medially and rugoso-punctate.

Elytra twice as long as wide, 3.9 times the length and 1.6 times the width of pronotum, widest at apical 1/3; dorsum rather strongly convex, highest at basal 1/4, somewhat tri-undulate, the basal undulation indistinct; disc with rows of punctures, the punctures in inner portion small and often finely striate, those in lateral portion becoming coarser and foveolate; intervals gently convex in inner portion, rather strongly raised in lateral portion, scattered with microscopic punctures, each with a fine, long hair; base weakly ridged due to depressed basal portions of 5 inner rows of punctures; humeri feebly swollen; apices without any peculiarities.

Male anal sternite semicircularly concave at apex, which is slightly emarginate. Male protibiae with ventral sides very weakly gouged in medial 3/5; male metatibiae very weakly twisted, with inner sides gouged in basal halves; ratios of the lengths of pro-, meso- and metatarsomeres: 0.24, 0.2, 0.2, 0.22, 1.2; 2.42, 0.86, 0.65, 0.53, 1.39; 1.97, 0.62, 0.48, 1.51.

Male genitalia rather robust, strongly curved near base in lateral view, 2.7 mm in length, 0.63 mm in width; basal piece slightly elongated oval, 1.5 mm in length; fused lateral lobes somewhat nib-shaped, 1.2 mm in length.

Body length: 13.5–15.5 mm.

Holotype: ♂, Mt. Doi Pui, nr. Chiang Mai, V-1985, A. COTTON leg. (NSMT). Paratypes: 1 ex., same data as for the holotype; 1 ex., 3-V-1985, 2 exs., 17-V-1985, Doi Suthep, Chiang Mai Pref., M. TAO leg.; 1 ex., Phuping Palace, Chaing Mai Pref., 20~21-V-1985, H. AKIYAMA leg.; 1 ex., Chaing Mai, 1988, 1 ex., Doi Sang, 26-V-1990, 1 ex., Wiang Pa Pao, Chaing Mai, 3-III-1988, 1 ex., Chiang Dao, Chiang Mai

Prof., 1989, no collector's name; 1 ex., Fang, 14-V-1996, native collector; 1 ex., Chiang Mai env., V-1995, 1 ex., Doi Pui, 9-V-1985, no collector's name (BC).

Notes. This new species resembles *S. nodieri* PIC, 1936, from Tonkin, but can be easily distinguished from the latter by the larger and stouter body with stronger and closer pronotal punctures, and clearly undulate elytra with stronger punctures.

***Strongylium hideoi* sp. nov.**

(Fig. 13)

Piceous, with mouth parts, gula, claws, etc., lighter in colour; head and pronotum feebly alutaceously shining, elytra, metasternum and abdomen gently, rather vitreously shining; each surface almost glabrous except for abdomen, which is microscopically haired. Rather elongate and moderately convex longitudinally.

Head transversely elliptical, very weakly micro-shagreened, rather closely and finely punctate, each puncture with a microscopic bent hair; clypeus wide, feebly depressed in basal portion, weakly bent downwards in front, bordered from frons and genae by a fine, widely arcuate suture; genae oblique, with roundly raised outer margins; frons somewhat T-shaped, gently inclined forwards; eyes large and transversely comma-shaped, strongly convex laterad, rather triangularly inlaid into head, diatone about 1/9 times the width of an eye diameter; vertex with a shallow impression between posterior parts of eyes. Antennae reaching basal 1/5 of elytra, 8 apical segments more or less flattened and dilated to each apex, ratio of the length of each segment from basal to apical: 0.65, 0.2, 0.75, 0.8, 0.7, 0.7, 0.65, 0.65, 0.6, 0.6, 0.65.

Pronotum quadrate, 1.25 times as wide as long, widest at the middle; apex nearly straight, finely rimmed, the rim rather closely and finely punctate; base slightly wider than apex, very slightly bisinuous and rimmed, the rim gently thickened in middle, and scattered with fine punctures; sides feebly produced laterad, steeply declined to lateral margins, which are finely though clearly ridged, the ridges barely visible from above; front angles rounded, hind angles rectangular; disc gently convex, weakly depressed before base in middle and obliquely impressed at base on each side, very weakly micro-shagreened, closely punctate, each puncture with a microscopic short bent hair. Scutellum subcordate and slightly elevate, polished though scattered with fine punctures in lateral portions.

Elytra 2.2 times as long as wide, 4 times the length and 1.5 times the width of pronotum, very weakly widened posteriad, widest at apical 4/9; dorsum gently convex, highest at basal 1/3; disc punctate-grooved, the punctures in grooves small and rounded at each bottom, rhombically notching intervals at upper edges, those in lateral portions distinctly so; intervals gently convex, very weakly micro-shagreened, scattered with minute punctures, sparsely and somewhat transversely micro-aciculate; humeri and apices not modified.

Male anal sternite weakly depressed in apical portion and slightly truncate at apex; male legs without any peculiarities, ratios of the lengths of pro-, meso- and

metatarsomeres: 0.3, 0.25, 0.25, 0.25, 1.2; 1.35, 0.75, 0.65, 0.5, 1.3; 1.2, 0.7, 0.5, 1.3.

Male genitalia somewhat elongated fusiform, almost straight in lateral view, very weakly constricted between basal piece and lateral lobes, 2.6 mm in length and 0.6 mm in width; fused lateral lobes 1.3 mm in length with rather stout apices.

Body length: 13.5 mm.

Holotype: ♂, nr. Chiang Mai, 3-V-1994, K. KUME leg. (NSMT). Paratypes: 2 exs., same data as for the holotype; 1 ex., 14-V-1985, 1 ex., 18-V-1985, Ban Nang Bang, nr. Sai Yok National Park, Kanchanaburi Pref., W Thailand, H. AKIYAMA leg.; 1 ex., 11-V-1985, 1 ex., 14-V-1985, Ban Nang Bang, M. SAWAI leg.; 1 ex., Ban Huai Po, 1,700 m alt., Mae Hong Son Pref., 24~30-VI-1993, 1 ex., Khun Yuan, 3-VII-1993, J. SCHNEIDER leg., 1 ex., Pai, 20~26-V-1996, A. KUDRNA leg.; 1 ex., Nna Pha Knab, 11~15-V-1993, P. PACHOLATKO & L. DEMBICKY leg. (BC); 1 ex., Ban Si Lang, Mae Hong Son Pref., 23~31-V-1991, L. DEMBICKY leg., 1 ex., Ban Pha Knap, Nan Pref., 15~20-V-1992, P. PACHOLATKO leg. (Nat. Hist. Mus. Viden).

Notes. This new species somewhat resembles *S. fujitai* MASUMOTO, 1981, from Taiwan, but can be distinguished from the latter by the body darker in colour with head and pronotum closely punctate, pronotum without medial groove, and elytral punctate-grooves obviously coarser.

Strongylium sawaiae sp. nov.

(Fig. 14)

Brownish black, with 2 basal segments of antennae and apical halves of 11th, mouth parts, gula, tibiae, etc., lighter in colour; head and pronotum gently shining, elytra feebly sericeously so, ventral surface weakly, somewhat alutaceously shining; each surface almost glabrous. Rather elongate and moderately convex.

Head transversely elliptical, weakly micro-shagreened, rather closely scattered with small punctures; clypeus almost elliptical, gently inclined forwards, moderately bent downwards in apical portion, clearly bordered from frons and genae by arcuate sulcus; genae oblique, gently raised, with rounded outer margins; frons somewhat T-shaped, moderately inclined forwards, coarsely punctate before eyes; eyes subreniform, rather strongly convex laterad, obliquely inlaid into head, diameter about 1/5 times the width of an eye diameter; vertex with a shallow, somewhat rhombical impression between posterior portions of eyes. Antennae reaching basal 1/5 of elytra, 7 apical segments weakly flattened and rather distinctly dilated to each apex, ratio of the length of each segment from basal to apical: 0.4, 0.2, 0.4, 0.35, 0.55, 0.5, 0.55, 0.5, 0.5, 0.5, 0.6.

Pronotum quadrate, 1.3 times as wide as long, widest slightly before the middle; apex very feebly emarginate and rimmed, the rim slightly thickened in middle and microscopically punctate; base wider than apex, very slightly bisinuous and ridged, the ridge being thicker than the apical rim, microscopically punctate; sides gently produced laterad, rather steeply declined to lateral margins, which are finely rimmed, the rim barely visible from above; front angles rounded, hind angles obtusely angulate;

disc gently convex, longitudinally grooved in basal 2/3, impressed on each side at apical 2/5, basal 1/3, and also impressed at base, very weakly micro-shagreened, rather closely and irregularly scattered with small punctures, which are almost rounded and slightly larger than pronotal ones. Scutellum triangular with rounded apex, depressed at base and raised in apical portion, rather distinctly polished.

Elytra elongated subelliptical, 2.2 times as long as wide, 4 times the length and 1.4 times the width of pronotum, feebly widened apicad and widest at apical 2/5; dorsum moderately convex and highest at the middle; disc punctate-grooved, the punctures in grooves longitudinal and rather closely set; intervals gently convex, very weakly micro-shagreened, scattered with microscopic punctures, very weakly, somewhat transversely wrinkled; humeri and apices without any peculiarities.

Male anal sternite weakly emarginate at apex; legs without peculiarities, ratios of the lengths of pro-, meso- and metatarsomeres: 0.25, 0.18, 0.2, 0.2, 1.2; 1.5, 0.6, 0.5, 0.35, 1.25; 1.5, 5.5, 0.4, 1.3.

Male genitalia slender, and weakly curved in lateral view, 2.4 mm in length and 0.35 mm in width; fused lateral lobes 0.8 mm in length with acute apices.

Body length: 11 mm.

Holotype: ♂, Doi Pa Muang, Hang Chat, Lampang Pref., N. Thailand, 18-V-1985, M. SAWAI leg. (NSMT).

Notes. This new species also resembles *S. fujitai* MASUMOTO, 1981, from Taiwan, but can be distinguished from the latter by the smaller and slightly robuster body with somewhat serrated antennae, more oblique eyes, and elytral punctures obviously longitudinal.

Strongylium roifeedaatum sp. nov.

(Fig. 15)

This new species resembles *S. cultellatum* MÄKLIN, 1864, originally described from Hongkong and widely distributed in Southeast Asia including Japan, but can be distinguished from the latter by the following characteristics:

Body a little robuster with basal halves of antennae, mouth parts and legs rather distinctly reddish brown. Head less convex; clypeus more finely punctate, more clearly bordered from frons by arcuate sulcus; outer margins of genae not rounded but obtusely angulate; frons more boldly T-shaped, less steeply inclined forwards, more coarsely rugoso-punctate; eyes comparatively narrowly inlaid into head, diatone wider and about 1/4 times the width of an eye diameter; vertex more distinctly impressed between posterior portions of eyes. Antennae obviously shorter, barely reaching basal 1/5 of elytra, 5 apical segments shortened, 5th to 10th rather triangular, ratio of the length of each segment from basal to apical: 0.5, 0.25, 0.7, 0.6, 0.4, 0.4, 0.35, 0.35, 0.3, 0.3, 0.4.

Pronotum subquadrate, 1.2 times as wide as long, more convex above; base more thickly bordered. Scutellum not triangular but widely subcordate, more distinctly ele-

vated, closely rugoso-punctate.

Elytra 2.3 times as long as wide, 4 times the length and 1.54 times the width of pronotum; dorsum more noticeably depressed longitudinally; disc with rows of larger punctures, which are more sparsely set (3 punctures in a central 1 mm), upper edge of each puncture with a small tubercle on each side; intervals more distinctly clothed with microscopic hairs, 3rd, 5th and 7th intervals more distinctly ridged; apices more distinctly produced posteriad.

Male anal sternite not truncate but rounded at apex; legs without any peculiarities; ratios of the lengths of pro-, meso- and metatarsomeres: 0.25, 0.15, 0.2, 0.2, 1.2; 1.25, 0.65, 0.5, 0.4, 1.25; 1.5, 0.65, 0.45, 1.3; claws slightly more developed.

Male genitalia smaller, weakly curved in lateral view, 2.3 mm in length and 0.4 mm in width, very slightly constricted between basal piece and lateral lobes; fused lateral lobes 1 mm in length, scattered with punctures and shallowly grooved only in apical half, with apices more sharply pointed.

Body length: 12.5 mm.

Holotype: ♂, Doi Pui, approx. 1,600 m alt., 3-VI-1986, H. HIRASAWA leg. (NSMT). Paratypes: 1 ex., Doi Suthep, 15-V-1996, 1 ex., 19-V-1996, K. MASUMOTO leg.; 9 exs., Soppong, 1,500 m alt., 7-12-V-1996, S. BEČVÁŘ leg., 3 exs., Doi Pui, 1,600 m alt., 2-6-V-1966, V. KUBÁN leg., 3 exs., same data, J. HORÁK leg. (BC).

Strongylium roiyonum sp. nov.

(Fig. 16)

Blackish brown, with antennae, mouth parts, legs, etc., lighter in colour; head and pronotum somewhat alutaceous, elytra feebly shining, ventral surface partly alutaceous; each surface almost glabrous, though each puncture on dorsal surface is clothed with a microscopic bent hair. Rather elongate and strongly convex longitudinally.

Head rather transversely elliptical, micro-shagreened, closely and finely punctate, each puncture with a microscopic bent hair; clypeus short pentagonal, rather distinctly flattened in basal portion, gently inclined forwards, moderately bent downwards in front, with fronto-clypeal border widely triangular; genae oblique and gently raised, with outer margins rounded; frons finely Y-shaped, gently inclined forwards; eyes very large, widely convex laterad, rather broadly and obliquely inlaid into head, diatone 1/14 times the width of an eye diameter; vertex with a longitudinal impression between posterior portions of eyes. Antennae subfiliform, reaching basal 1/3 of elytra, ratio of the length of each segment from basal to apical: 0.45, 0.2, 0.78, 0.63, 0.6, 0.6, 0.6, 0.55, 0.55, 0.5, 0.6.

Pronotum quadrate, slightly wider than long, widest at the middle; apex nearly straight and finely rimmed, the rim being scattered with minute punctures; base slightly wider than apex, very slightly bisinuous, bordered and ridged, the ridge being thicker than the apical rim, and scattered with minute punctures; sides gently produced laterad and sinuate before base, rather steeply declined to lateral margins, which are very

finely ridged in anterior halves, the ridge almost invisible from above; front angles rounded, hind angles angulate; disc moderately convex though weakly depressed medially in basal portion, and obliquely impressed at base in lateral portions, micro-shagreened, closely rugoso-punctate, each puncture with a microscopic bent hair. Scutellum subcordate, slightly elevated posteriad, rather polished though feebly micro-shagreened and sparsely scattered with small punctures in middle.

Elytra elongate, 2.5 times as long as wide, 4 times the length and 1.4 times the width of pronotum, very slightly narrowed posteriad; dorsum rather strongly convex, though weakly flattened in antero-medial 2/3; disc with rows of rather large and deep punctures, rounded at bottom and subquadrate at upper edge, each puncture with 3 small, inwardly pointed granules, one on inner margin, another on front margin and the other on hind margin; intervals very weakly micro-shagreened, finely ridged, the ridges irregularly curved or somewhat feebly wrinkled, with rows of sparse and small punctures, and irregularly scattered with small punctures, which are clothed with microscopic bent hairs; humeri normal in shape; apices feebly dehiscent.

Male anal sternite unmodified; legs without peculiarities; ratios of the lengths of pro-, meso- and metatarsomeres: 0.45, 0.25, 0.3, 0.25, 1.2; 1.3, 0.7, 0.55, 0.45, 1.25; 1.6, 0.65, 0.55, 1.2.

Male genitalia fusiform, gently curved in lateral view, 1.5 mm in length and 0.3 mm in width; basal piece weakly narrowed in apical portion; fused lateral lobes 0.6 mm in length, with rather acute apices.

Body length: ca. 8.5 mm.

Holotype: ♂, Doi Pui, 1,620 m alt., Chiang Mai Pref., N Thailand, 29-IV-1989, H. HIRASAWA leg. (NSMT). Paratypes: 1 ex., Soppong, Pai Dist., Mae Hong Son Pref., 1,800 m alt., 1-8-V-1993, PACHOLATKO & DEMBICKY leg. (coll. H. J. BREMER); 1 ex., Doi Pui, 1,600 m alt., 2-6-V-1966, V. KUBÁN leg., 1 ex., same data, J. HORÁK leg., 2 exs., Soppong, 1,500 m alt., S. BEČVÁŘ leg. (BC).

Notes. This new species is a member of the species-group of *S. cultellatum*. It is distinguishable from others by the smaller body with hairy and feebly rugose elytra. The arrangement of granules around elytral punctures is also an important character for classification of the group.

Strongylium lanathai sp. nov.

(Fig. 17)

A remarkable species with no close relative previously known.

Piceous, with femora except for basal portions, basal portions of tibiae, claws, etc., reddish brown, 3 basal segments of antennae, and basal portions of femora pale yellow; each surface somewhat alutaceously shining and almost glabrous. Fairly elongate and rather strongly convex.

Head subdecagonal, weakly micro-shagreened, rather closely and finely punctate; clypeus semicircular and gradually inclined forwards, gently bent in front, subparallel-

sided in anterior portion, bordered from frons by widely arcuate, fine sulcus; genae oblique, rather strongly raised, with rounded outer margins; frons rather widely T-shaped, moderately inclined forwards; eyes medium-sized, somewhat cordate, roundly convex laterad, gently inlaid into head, diameter about 1/3 the width of an eye diameter; vertex with shallow longitudinal groove medially. Antennae filiform, reaching the middle of elytra, ratio of the length of each segment from basal to apical: 0.35, 0.2, 1.05, 0.9, 0.75, 0.65, 0.6, 0.55, 0.5, 0.45, 0.55.

Pronotum somewhat short barrel-shaped, slightly wider than long, widest at the middle; apex almost straight, widely triangularly ridged and bordered, the ridge scattered with fine punctures; base feebly bisinuous, almost straightly bordered and ridged, the ridge thickened in middle and scattered with fine punctures; sides steeply inclined, neither ridged nor bordered, with a pair of tubercles at the middle, which are easily visible from above; front angles obtuse, hind angles angulate; disc moderately convex, longitudinally grooved medially, obliquely impressed at base on each side, weakly micro-shagreened, sparsely scattered with small punctures, each with a microscopic hair. Scutellum linguiform, rather strongly raised posteriad, micro-shagreened, sparsely punctato-aciculate.

Elytra 2.5 times as long as wide, 4.1 times the length and 1.5 times the width of pronotum, feebly widened posteriad, widest at apical 2/7; dorsum bi-undulate, the posterior undulation more distinct, highest at apical 3/7; disc with rows of punctures, those in internal and posterior portions small, closely set, and striated, those in antero- and medio-lateral portions large and coarse, forming slightly transverse foveae; intervals in internal and posterior portions gently convex, 3rd and 5th ridged in basal portions, those in antero-lateral portion rather transversely connected with one another; humeri unmodified; apices truncate, slightly toothed on each side.

Male anal sternite parabolically depressed in apical portion; male legs distinctly slender; male protibiae with ventral sides weakly gouged and haired in apical halves; male metatibiae distinctly twisted, with the inner faces distinctly gouged widely in middle; ratios of the lengths of pro-, meso- and metatarsomeres: 0.4, 0.25, 0.25, 0.25, 1.2; 2.55, 0.8, 0.7, 0.5, 1.3; 3.0, 1.05, 0.6, 1.35.

Male genitalia short fusiform, and gently curved in lateral view, 1.8 mm in length and 0.4 mm in width, fused lateral lobes nib-shaped, 0.6 mm in length.

Body length: 9.6 mm.

Holotype: ♂, Doi Suthep, Chiang Mai Pref., N Thailand, 31-V-1985, no collector's name (NSMT). Paratype: 1 ex., Ban Van Eua, Vientiane, Laos, 15-VI-1969, J. RONDON leg. (MNHNP).

Strongylium chiangdaoense sp. nov.

(Fig. 18)

A beautiful species not closely related to any of the known congeners.

Purplish, with basal portion of elytra brassy, antennae black, mouth parts and two

apical sternites of abdomen yellowish; each surface metallicly shining and almost glabrous. Oblong-oval, moderately convex above.

Female. Head subdecagonal, irregularly and not so closely punctate, longitudinally impressed between eyes; clypeus transverse and gently inclined apicad, subparallel-sided in middle, and weakly bent downwards in front, bordered from frons by widely U-shaped sulcus; genae obliquely and gently raised, with rounded outer margins; frons rather wide, moderately inclined forwards; eyes medium-sized, somewhat securiform, moderately convex laterad, rather triangularly inlaid into head, diameter about 1.1 times the width of an eye diameter. Antennae reaching base of elytra, 7 apical segments flattened and rather distinctly clavate, ratio of the length of each segment from basal to apical: 0.33, 0.2, 0.55, 0.35, 0.35, 0.35, 0.4, 0.4, 0.35, 0.35, 0.4.

Pronotum transverse, 1.6 times as wide as long, widest at the middle; apex nearly straight and rimmed, the rim slightly thickened in middle and scattered with microscopic punctures; base bordered and almost straightly rimmed, the rim widened in middle, scattered with microscopic punctures; sides gradually declined to lateral margins, which are widely triangular and distinctly punctate-grooved and finely rimmed; front angles rounded, hind angles obtuse; disc gently and broadly convex, irregularly, not so closely scattered with small punctures, with a longitudinal impunctate area in middle. Scutellum subcordate, almost smooth, though sparsely scattered with minute punctures and aciculations.

Elytra rather oblong-ovate, 1.8 times as long as wide, 4.6 times the length and 1.5 times the width of pronotum, feebly widened posteriad, widest at apical 1/3; dorsum gently convex, very slightly flattened in antero-medial portion, highest at basal 1/3; disc punctato-striate, the striae often obsolete, the punctures small and rather closely set, those in lateral portion larger and coarser, forming slightly transverse foveae, 5th striae impressed at base; intervals feebly convex, scattered with minute punctures, and very slightly, transversely wrinkled; humeri moderately swollen; apices without any peculiarities.

Legs not slender; femora and tibiae distinctly flattened and gently thickened in middle; ratios of the lengths of pro-, meso- and metatarsomeres: 0.25, 0.2, 0.2, 0.2, 1.2; 1.5, 0.7, 0.5, 0.35, 1.3; 1.25, 0.35, 0.3, 1.3.

Body length: ca. 8 mm.

Holotype: ♀, Between Fang and Chiang Dao, Chiang Mai Pref., 22~23-V-1989, K. MASUMOTO leg. (NSMT).

Strongylium siisuai sp. nov.

(Fig. 19)

An isolated species recognized at first sight on its coloration.

Head and pronotum partly purple, cyaneous, or greenish golden, moderately shining, scutellum and its marginal portions of elytra purple, elytra reddish copper-coloured, rather strongly, metallicly shining, with area in basal 1/8 transversely

greenish golden, area between basal 1/8 to the middle with a transversely quadrate, dark bluish patch, whose marginal portions are purplish, and lateral portion of the purplish areas finely cyaneous, area between the middle to basal 5/8 again transversely greenish golden, its posterior margin finely cyaneous, area in apical 1/8 somewhat triangularly greenish golden, marginal portions of the triangular area cyaneous, ventral surface dark blue and moderately shining, antennae and legs almost brownish black, though more or less purplish or dark bluish in some parts; each surface almost glabrous. Oblong-ovate, rather strongly convex above.

Female. Head almost rounded, rather closely, irregularly punctate, the punctures sometimes fused with one another; clypeus transverse, subparallel-sided and bent downwards in anterior portion, bordered from frons by widely U-shaped sulcus; genae oblique, gently raised, with obtuse margins; frons rather wide, moderately inclined forwards, longitudinally impressed in the medial portion; eyes medium-sized and transversely comma-shaped, gently convex laterad, roundly inlaid into head, diatone about 2/3 times the width of an eye diameter. Antennae reaching basal 1/8 of elytra, distinctly claviform, 5th to 10th segments flattened and dilated to each apex, ratio of the length of each segment from basal to apical: 0.35, 0.2, 0.9, 0.55, 0.5, 0.5, 0.6, 0.45, 0.35, 0.3, 0.4.

Pronotum subquadrate, 1.5 times as wide as long, widest slightly behind the middle; apex almost straight and ridged, the ridge feebly thickened medially, smooth though microscopically punctate; base ridged and slightly bisinuous, the ridge being thicker and more closely scattered with microscopic punctures than apex; sides gradually declined to lateral margins, which are rounded, clearly bordered and finely rimmed, the rim visible from above; front angles rounded, hind angles obtusely angulate; disc moderately, somewhat transversely convex, with a pair of oblique impressions at basal 1/3, rather closely, irregularly punctate, each puncture with a microscopic bent hair. Scutellum triangular and smooth, sparsely scattered with microscopic punctures.

Elytra about twice as long as wide, 4.7 times the length and 1.5 times the width of pronotum, weakly widened posteriad and widest at apical 3/8, very slightly micro-shagreened and feebly wrinkled; dorsum rather strongly convex, slightly undulate at basal 1/7; disc finely punctato-striate, the punctures small and closely set; intervals weakly convex, scattered with microscopic punctures, each puncture with a microscopic bent hair; sides steeply declined to lateral margins, weakly impressed from lateral portions at basal 1/3; humeri rather distinctly swollen; apices roundly produced posteriad.

Anal sternite feebly truncate; legs without peculiarities; ratios of the lengths of pro-, meso- and metatarsomeres: 0.3, 0.25, 0.25, 0.25, 1.2; 1.5, 0.8, 0.6, 0.4, 1.35; 1.5, 0.6, 0.4, 1.25.

Body length: 8.5–9 mm.

Holotype: ♀, Doi Pui, Chiang Mai Pref., 20–VI–1984, no collector's name (NSMT). Paratypes: 1 ex., Ban Huai Po, 1,600–2,000 m alt., Mae Hong Son Pref., NW Thailand, 9–16–V–1991, J. HORÁK leg. (Coll. H. J. BREMER); 3 exs., Soppong,

1,500 m alt., 7~12-V-1996, S. BEČVÁŘ leg. (BC); 1 ex., Doi Suthep, 3-VI-1986, H. HIRASAWA leg.

Strongylium siidemum sp. nov.

(Fig. 20)

Blackish brown, with mouth parts, tibiae and tarsi lighter in colour; head and pronotum feebly, somewhat sericeously shining, elytra rather strongly, vitreously shining, pro- and mesosterna feebly shining, metasternum and abdomen moderately so; each surface almost glabrous except for abdomen, which is sparsely and finely haired. Rather elongate and subcylindrical.

Head subdecagonal, weakly micro-shagreened and rather closely punctate, the punctures often fused with one another, each with a microscopic bent hair; clypeus somewhat trapezoidal and not so wide, gently inclined forwards, weakly bent downwards in front, bordered from frons by sublinear groove; genae obliquely, rather strongly raised, with obtuse outer margins subparallel in basal portions; frons rather steeply inclined forwards; eyes medium-sized, subreniform, rounded laterad, rather triangularly inlaid into head, grooved along each inner margin, diatone about 2/7 the width of an eye diameter; vertex convex though flattened medially. Antennae subfiliform, though slightly thickened apicad, reaching basal 1/8 of elytra, ratio of the length of each segment from basal to apical: 0.4, 0.2, 0.7, 0.55, 0.45, 0.45, 0.45, 0.4, 0.4, 0.45, 0.52.

Pronotum subquadrate, 1.2 times as wide as long, widest slightly before the middle; apex almost straight and rimmed, the rim slightly thickened in middle, scattered with minute punctures; base bordered by groove and bisinuously rimmed, the rim scattered with minute punctures; sides weakly produced laterad and steeply declined to lateral margins, which are finely ridged, though the ridges are hardly visible from above; front angles rounded, hind angles slightly angulate; disc moderately convex, with a shallow longitudinal groove medially, and also with a pair of oblique impressions at base, weakly micro-shagreened and rather closely punctate, the punctures often fused with one another, each with a microscopic bent hair. Scutellum triangular, micro-shagreened and micro-aciculate, weakly depressed in the medial portion, with lateral portions scattered with a few fine punctures.

Elytra rather elongate, 2.4 times as long as wide, 4.5 times the length and 1.4 times the width of pronotum, widest at apical 3/8; dorsum gently convex longitudinally, very weakly undulate, slightly flattened in antero-internal portion; disc with rows of punctures, the rows often shallowly grooved in inner portion, the punctures small, rather deep, and somewhat elongate, those in lateral portion becoming larger and forming foveae and areas between them often very weakly, transversely raised, 5th striae rather noticeably impressed in basal portion; intervals feebly convex, very slightly, finely undulate, scattered with microscopic punctures, with sutural intervals ridged in basal portion due to rather distinctly impressed sutural striae; humeri moderately

swollen; apices slightly dehiscent.

Male anal sternite almost simple in shape; male legs without peculiarities; ratios of the lengths of pro-, meso- and metatarsomeres: 0.5, 0.25, 0.25, 0.2, 1.2; 1.4, 0.65, 0.55, 0.4, 1.25: 1.65, 0.75, 0.5, 1.3.

Male genitalia subfusiform, weakly curved in lateral view, 2 mm in length and 0.4 mm in width; fused lateral lobes nib-shaped, 0.7 mm in length, with pointed apices.

Body length: ca. 11 mm.

Holotype: ♂, near Chiang Mai, 3-V-1994, K. KUME & M. ITO leg. (NSMT).

Notes. The present new species somewhat resembles *S. gardneri* BLAIR, 1930, from northern India, but can be distinguished from the latter by the smaller body with head and pronotum more closely punctate, elytra with obvious rows of often striated punctures, and with shorter and bolder antennae.

要 約

益本仁雄：アジア産ナガキマワリ族 (*Strongyliini*) の研究。II. 北部タイのナガキマワリ属 (*Strongylium*) の新種 (その1)。—— アジア産ナガキマワリ族の研究の第2回として、北部タイで採集されたナガキマワリ属を取り上げた。これまで、本属に関するこの地域からの報告や新種記載は皆無であるが、少なくとも50種以上が分布している。今回の小論では、そのうちの20種を新種として記載した。 *Strongylium doisuthepense* sp. nov., *S. taoi* sp. nov., *S. fangense* sp. nov., *S. maleengthai* sp. nov., *S. soncai* sp. nov., *S. hirasawai* sp. nov., *S. tsuyukii* sp. nov., *S. phomae* sp. nov., *S. phraense* sp. nov., *S. nakpraati* sp. nov., *S. miikhonum* sp. nov., *S. doipuiense* sp. nov., *S. hideoi* sp. nov., *S. sawaiaie* sp. nov., *S. roifeedaatum* sp. nov., *S. roiyonum* sp. nov., *S. lanathai* sp. nov., *S. chiangdaoense* sp. nov., *S. siisuai* sp. nov., および *S. siidemum* sp. nov. である。

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