

A Review of the Genera *Aneuclis* Förster and *Sathropterus* Förster (Hymenoptera, Ichneumonidae, Tersilochinae)

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Abstract—The genera *Aneuclis* Förster and *Sathropterus* Förster are reviewed. The following 10 species of the genus *Aneuclis* are described: *A. aciculifera* sp. n. (southern Siberia), *A. atra* sp. n. (the Carpathians, Crimea, and Caucasus), *A. horstmanni* sp. n. (southern Siberia), *A. luteola* sp. n. (the Russian Far East), *A. mongolica* sp. n. (Mongolia), *A. semeonovnae* sp. n. (Mongolia), *A. stepposa* sp. n. (Mongolia), *A. stigmata* sp. n. (Middle Asia), *A. tarbagataica* sp. n. (Kazakhstan), and *A. unica* sp. n. (southern Siberia). A key to Palaearctic species of the genus *Aneuclis* is given. New data on the distribution of *Sathropterus pumilis* (Holmgr.) and species of the genus *Aneuclis* are presented.

The genus *Aneuclis* Förster and the evolutionary closely related monotypic genus *Sathropterus* Förster are characterized by a widely open brachial cell of the fore wing (Fig. 10), the presence of the basal carina (instead of the basal area) on the propodeum, and absence (or poor development) of the sternauli and glymmae. However, the genus *Sathropterus* clearly differs from *Aneuclis* in the absence of the recurrent vein and in the apically sinuous ovipositor (Fig. 17).

The European fauna of *Aneuclis* comprising 5 species was revised by Horstmann (1971). The results of this revision were also included in a key to the family Tersilochinae from the European part of the USSR (Kasparyan, 1981), and a catalogue of the World fauna of Ichneumonidae (Yu and Horstmann, 1997). One more species (*A. rufipleuris*) was described from the Canary Islands by Horstmann (1980). In the present paper, 10 new Palaearctic species of the genus *Aneuclis* are described and new data on the distribution of previously known species of this genus and also of *Sathropterus pumilis* (Holmgr.) are presented. A key to all Palaearctic species of the genus *Aneuclis* is also given. In addition to the Palaearctic Region, the genus *Aneuclis* has been recorded in North America, South Africa, and the Oriental Region (Townes, 1971), but no species have been described out of the Palaearctic Region.

Species of the genus *Aneuclis* are known as endoparasites of beetles of the family Nitidulidae and, less frequently, Curculionidae and Chrysomelidae.

The types of new species, except for those especially mentioned, are deposited in the Zoological Insti-

tute, Russian Academy of Sciences (St. Petersburg). The distribution of species is indicated according to Horstmann (1971, 1981), or additionally with a reference to the corresponding publications; the countries, where a species has been recorded for the first time, are marked with an asterisk.

The genus *ANEUCLIS* Förster, 1869

Type species *Usurgus rufipes* Szepliget, 1899 (*Thersilochus maritimus* Thomson, 1889).

Description. Female antenna 15–21-segmented; male antenna 16–24-segmented. Head behind eyes strongly and roundly narrowing, length of temple less than width of eye (Figs. 1–4). Mesosoma more or less granulate, usually without punctures or rugulae. Sternauli absent or traced as rugulose areas. Propodeum with basal carina 0.15–0.50 times as long as apical area. Outer posterior angle of fore-wing brachial cell widely open (Fig. 10). Glymma absent or small and shallow.

All species of this genus (except for *A. rufipleuris* known only from the Canary Islands), including those described from Europe, occur in the steppe and forest-steppe zones of Kazakhstan, southern Siberia, Central Asia, and Mongolia, being mainly associated with herbaceous landscapes. Such an association is probably accounted for by their specialization to parasitism on larvae of beetles trophically associated with herbaceous plants of the family Brassicaceae, because all the known hosts of the genus *Aneuclis* develop on cruciferous plants.

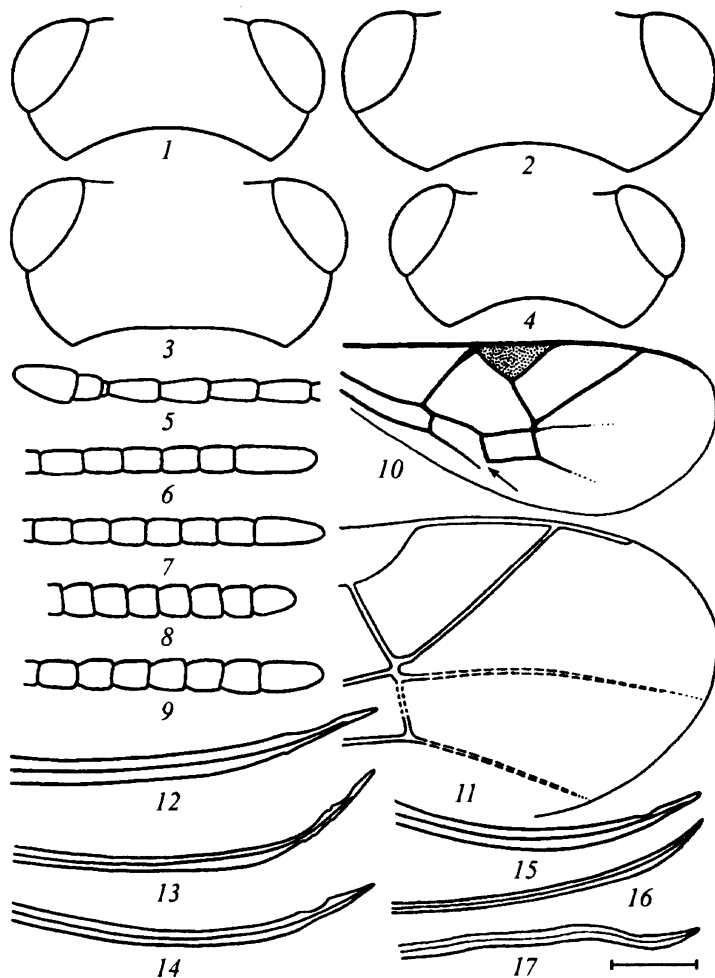


Fig. 1-17. (3, 5, 11, 12) *Aneuclis horstmanni* sp. n.; (2, 6, 13); *A. semeonovnae* sp. n.; (10) *A. anterior* (from Horstmann); (7, 14) *A. stigmata* sp. n.; (1, 8) *A. atra* sp. n.; (4, 9, 15) *A. luteola* sp. n.; (16) *A. aciculifera* sp. n.; (17) *Sathropterus pumilis* (from Horstmann). (1-4) head, dorsal view; (5) antennal base, lateral view; (6-9) apex of antenna, lateral view; (10) fore wing; (11) distal part of fore wing; (12-17) apex of ovipositor, lateral view. Scale (except for Figs. 10, 11, and 17) 0.2 mm.

Only 2 species have been recorded from the Russian Far East, which is unexpectedly less in comparison with other large genera of Tersilochinae (*Barycnemis* Först., *Diaparsis* Först., and *Phradis* Först.); the Far Eastern fauna of these genera comprises nearly the same number of species as the European one.

A Key to Species of the Genus Aneuclis

The number of the antennal segments is indicated for females; in males, this number is usually greater by 1-3.

- 1. Second recurrent vein interstitial (Fig. 10).—Antenna 16-17-segmented.
—Second recurrent vein postfurcal (Fig. 11).
- 2. Width of pterostigma 1.3 times length of 1st radial abscissa.—Ovipositor sheath 2.6 times as long as tergite I 10. *A. mongolica* sp. n.

- Width of pterostigma equal to, or less than length of 1st radial abscissa.
- 3. Lower part of pronotum yellowish, distinctly differing in color from black mesosoma.—Ovipositor sheath 2.5 times as long as tergite I 11. *A. rufipleuris* Horstm.
—Lower part of pronotum black, of same color as rest of mesosoma.
- 4. Sternaulus absent, or surface in this place more densely granulate; ovipositor sheath about twice as long as tergite I (in the Asian part of the range, sheath occasionally 3 times as long as tergite I); hind coxa usually darkened 5. *A. incidens* (Thoms.).
—Sternaulus weak, with oblique rugulae; ovipositor sheath about 3 times as long as tergite I; all coxae yellow 2. *A. anterior* Horstm.

5. Ovipositor sheath 2–3 times as long as tergite I ... 6.
—Ovipositor sheath shorter 7.
6. Petiolus of tergite I smooth on upper side; antenna 16–17-segmented; body length about 3 mm
..... 8. *A. maritima* (Thoms.).
—Petiolus of tergite I partly striate on upper side; antenna 19-segmented; body length about 4 mm
15. *A. tarbagataica* sp. n.
7. Metacarpus very short, slightly projecting distally beyond radial vein (its length less than 0.3 times distance between radial vein and wing apex); distance between propodeal spiracle and pleural carina equal to 3–4 diameters of propodeal spiracle.—Antenna 17–18-segmented, all segments distinctly elongate; pterostigma yellow to brownish yellow; basal carina of propodeum about 0.25 times as long as apical area; ovipositor sheath 1.0–1.2 times as long as tergite I 8.
—Metacarpus rather long, length of its 2nd section no less than 0.3 times as long as distance between radial vein and wing apex); distance between propodeal spiracle and pleural carina not exceeding 3 diameters of propodeal spiracle.
8. Mesonotum smooth, partly very finely and diffusely punctate; ovipositor strongly upcurved apically (Fig. 13) *A. semeonovnae* sp. n.
—Mesonotum mostly granulate, finely and moderately densely punctate; ovipositor upcurved along entire length *A. unica* sp. n.
9. Head weakly narrowing behind eyes; temple long (Fig. 3); antenna 19–21-segmented.—Ovipositor sheath about 1.5 times as long as tergite I
..... 6. *A. horstmanni* sp. n.
—Head strongly narrowing behind eyes; temple short (Figs. 1, 4); antenna 15–19-segmented 10.
10. Ovipositor sheath longer than tergite I 11.
—Ovipositor sheath shorter than, or as long as tergite I 14.
11. Ovipositor very slender, its height in median part not exceeding diameter of 1st segment of hind tarsus *A. aciculifera* sp. n.
—Ovipositor rather thick, its height in median part distinctly exceeding diameter of 1st segment of hind tarsus 12.
12. Pterostigma yellow to brownish yellow 13.
—Pterostigma brownish to dark brown.
13. Length of temple slightly less than width of eye; subapical antennal segments distinctly longer than wide (Fig. 7); basal carina of propodeum about half as long as apical area
..... 9. *A. melanaria* (Holmgr.).
—Length of temple half width of eye; subapical antennal segments as wide as long (Fig. 8); basal carina of propodeum about 0.25 times as long as apical area 3. *A. atra* sp. n.
14. Tergite I smooth at sides; antenna 15-segmented; subapical antennal segments 1.5 times as long as wide; temple and vertex smooth
..... 13. *A. stepposa* sp. n.
—Tergite I striate at sides; antenna 16–19-segmented; subapical antennal segments slightly longer than wide (Fig. 9); temple and vertex granulate (occasionally, temple partly smooth) 15.
15. Antenna 16–17-segmented; temple usually partly smooth; hind coxa darkened; metasoma uniformly black 4. *A. brevicauda* (Thoms.).
—Antenna 17–19-segmented; temple finely granulate; hind coxa usually uniformly yellow; metasoma yellowish brown behind segment I
..... 7. *A. luteola* sp. n.

1. *Aneuclis aciculifera* Khalaim, sp. n. (Fig. 16)

Material. Holotype: ♂, Russia, Chita Prov., Dauriskii Nature Reserve, Imalkan Distr., 1.VIII.1990 (Kotenko) (Schmallhausen Institute of Zoology, National Academy of Sciences of the Ukraine, Kiev; SIZK).

Description. Female. Length of temple less than width of eye; head roundly narrowing behind eyes. Upper tooth of mandible distinctly longer than lower one. Clypeus smooth, weakly granulate in apical part, finely and diffusely punctate, convex in lateral view. Length of gena slightly exceeding basal width of mandible. Antenna 17-segmented, all segments distinctly longer than wide. Head granulate and indistinctly punctate. Temple nearly smooth.

Mesosoma entirely granulate, finely punctate on most part. Sternauli absent. Distance between propodeal spiracle and pleural suture subequal to diameter of spiracle. Apical area nearly 3 times as long as basal carina.

Second recurrent vein of fore wing postfurcal, non-pigmented in anterior part. Metacarpus not reaching fore-wing apex. Length of 1st radial abscissa exceeding width of pterostigma.

Tergite I mostly smooth, with small glymma and groove before it. Tiridiae elongate. Ovipositor weakly upcurved along entire length and strongly upcurved before apex (Fig. 16), very slender; width of 1st segment of hind tarsus exceeding its height in median part; ovipositor sheath 1.5 times as long as tergite I.

Body black. Palpi, mandibles (except for teeth), lower part of clypeus, tegulae, and legs, all brownish yellow; coxae darkened. Antennal base yellowish brown. Pterostigma brown.

Size (mm): body length 3.2; fore-wing length 2.6; head width 0.8; length of mesosoma 1.2, width, 0.67; length of tergite I 0.3, width in anterior part, 0.26; length of ovipositor sheath about 1.25.

Male unknown.

Distribution. Russia (southern part of eastern Siberia).

Diagnosis. The new species differs from the closely related *A. maritima* in the very slender ovipositor (Fig. 16) with shorter sheath.

2. *Aneuclis anterior* Horstmann, 1971 (Fig. 10)

Material. Russia: 1 ♀, Voronezh Prov. (Khoperskii Nature Reserve, Varvarino). Kazakhstan: 1 ♀, Uralsk Prov. (Gory Vill., Ural River); 1 ♂, Akmola Prov. (Lake Zharkol, Terisakkan River, near Kokshetau. Austria: 1 ♀, "Rügen, Göhren, 31.VIII.1901, Dr. G. Enderlein S.," (paratype, Horstmann's collection).

Distribution. Austria, Bulgaria (Kolarov, 1987), Moldova, *Russia (Voronezh Prov.), *Kazakhstan (Uralsk and Akmola Provinces).

3. *Aneuclis atra* Khalaim, sp. n. (Figs. 1, 8)

Material. Holotype: ♀, Georgia, Akhaltsikhskii Distr., Khagi, mixed forest, 26.VI.1976 (Richter). Paratypes. Ukraine: 1 ♀, Zakarpatskaya Prov., Chernoe Vill., 15 km SE Vinogradov, oak forest and alder along a stream, 4.VIII.1989 (Kasparyan); 1 ♀, Crimea: Krasnoles'e, 6 km W Dobroe, 13.VI.1990 (Kasparyan); 1 ♀, Crimean Nature Reserve, 21 km of Alushta, Asport Cordon, along road, 19.VI.1976 (Tolkanits) (SIZK).

Description. Female. Head strongly roundly narrowing behind eyes (Fig. 1); length of temple nearly half width of eye. Upper tooth of mandible longer than lower one. Clypeus smooth, weakly granulate in apical part. Length of gena equal to basal width of mandible. Antenna 18-segmented, 4th and 5th segments 1.5 times as long as wide, subapical segments as long as wide. Head granulate; vertex and temple nearly smooth, matte.

Mesosoma entirely granulate. Sternaulus in the form of rugose area. Distance between propodeal spiracle and pleural suture 1.5–2.0 times diameter of spiracle. Apical area pointed in anterior part, occasionally rugose in posterior part, its longitudinal carinae indistinct in anterior part.

Second recurrent vein of fore wing strongly postfurcal, non-pigmented in anterior part. Metacarpus not reaching fore-wing apex. Length of 1st radial abscissa slightly exceeding width of pterostigma.

Tergite I flat and smooth on dorsal surface, its petiolus partly slightly striate at sides. Tiridiae distinctly elongate, very shallow. Ovipositor weakly thickened before apex, its sheath 1.75 times as long as tergite I.

Body black. Palpi, mandibles (except for teeth), lower half of clypeus, tegulae, and legs, all reddish brown; coxae and occasionally trochanters darkened. Pterostigma brown. Metasoma dark brown to black.

Size (mm): body length 2.6; fore-wing length 2.2; head width 0.76; length of mesosoma 1.0, width, 0.6; length of tergite I 0.63, width in anterior part 0.23; length of ovipositor sheath 1.1.

Male. Antenna 19-segmented, its apical segments slightly longer than wide.

Diagnosis. The new species is closely related to *A. melanaria*, differing from it in the short basal carina of the propodeum, short temple (Fig. 1), and black antenna with short segments (Fig. 8).

4. *Aneuclis brevicauda* (Thomson, 1889)

Material. A total of 20 ♀ and 2 ♂ examined. Russia: Kaluga. Lithuania: Neringa (Nida), Vilnius (Avičieniai), Pasvalys, Ignalina, Marijampolė. Belarus: Brest Prov. (David-Gorodok, floodland of Goryn River); Gomel Prov. (Turov; 20 km W Petrikov). Ukraine: Odessa Prov. (Kalinovka—Shirokoe), Kiev (Novoselki), Cherkassy Prov. (Kanev). Kazakhstan:

Akmola Prov. (Lake Ylektykol). Turkmenia: (Iol Dere Canyon, Kara Kala, western part of Kopet Dagh).

Distribution. Germany, Norway (Jussila, 1973), Sweden, Czechia (Šedivý, 1989), Poland (Sawoniewicz, 1982), *Russia (Kaluga Prov.), *Lithuania, *Belarus, *Ukraine, *Kazakhstan (Akmola Prov.), *Turkmenia.

Biology. A parasite of *Phyllotreta nemorum* (L.) (Chrysomelidae) (Horstmann, 1981). Emergence from May to September.

5. *Aneuclis incidens* (Thomson, 1889)

Material. A total of 188 ♀ and 12 ♂ examined. Russia: Kaliningrad Prov. (Baltiisk), Krasnodar Terr. (Sochi, Lazarevskoe), Stavropol Terr. (environs of Stavropol; Shpakovskoe), North Ossetia (Vladikavkaz), Daghestan (Terekli-Mekteb, Nogai steppe), Kalmykia (30 km NNW Sarpa, Lake Tsagan Nur), Astrakhan Prov. (20 km N Lake Baskunchak), Volgograd Prov. (Volgograd; Lake Elton, Chernaya River), Chelyabinsk Prov. (15 km SW Chebarkul, Kundravy), Tuva (Kyzyl), Buryatia (Selenduma Vill.), Chita Prov. (Dauriskii Nature Reserve; Aginskoe, 15 km SE Olovyannaya, Onon River; 16 km ENE Nerchinskii Zavod; Bylyra, Kyra River floodland; Adrianovka Station, 20 km SE Karymskaya Vill.; Urulyngui Vill.), Primorskii Terr. (environs of Spassk; Novokachalinsk; Gornotaezhnoe; 10 km S Slavyanka; 25 km SW Slavyanka, Sukhanovka; 10 km SE Chernigovka; Khasan). France: (Kofa). Lithuania: Vilnius (Avičieniai). Moldova (Kagul). Ukraine: Rovno (Kuznetsovoi Vill., Styr River), Odessa (Lake Kubanu, Danube River delta), Cherkassy (Kanev), Nikolaev (15 km E Ochakovo), and Kherson (Lake Dzharylgach) Provinces, Crimea (Simpheropol, Alma River; Angarsk Pass, Chatyr Dagh Mt.). Kharkov Prov. (near Volchansk, Efimovka Vill., SE Izyum, Askol River delta), Donetsk Prov. (45 km N Mariupol, "Kamennye Mogily" Nature Reserve; Bogorodichnoe, 6 km W Slavyanogorsk; Zakotnoe; Shurovo). Georgia: Abkhazia (Pitsunda, Lidzava; Cherkessko-Polyanskoe forestry, 650 m), Tbilisi, Aspinza Distr. (Vardzia), Gori Distr. (Kemans locality). Kazakhstan: Uralsk Prov. (Dzhanybek; Kharkin), Kokchetav Prov. (Petropavlovsk), Akmola Prov., Lake Kozhakol, Lake Ylektykol; Kokshetau Mts., Terissakan River; Lake Zharkol), Karaganda Prov. (30 km SE Zhana-Ark Vill. (= Atasu), Kinelly Mt.; 35 km SSW Zhana-Ark Vill., Koksengir Mt.; Lake Ymtykkol), Semipalatinsk Prov. (55 km NW Zharma Vill.), Vostochno-Kazakhstanskaya Prov.

(10 km ENE Tavricheskoe, Aktobe Mt.; 10 km SSE Przhevalsk, Saur Mt. Range; Kendyrlyk Vill. (Zaisan); 18 km SE Zaisan, Temirsu locality; 30 km NE Blagodarnoe, Taiau Mt; Maikopchagai (western Zaisan); Sekisovka; 8 km NW Verkhubinka, Uba River near mouth of Malaya Ubinka River). Tajikistan (Kondara, Varzob Valley, 1100 m; Kulyab; Ramitskii Nature Reserve, Romit; Bazakhman, Bazom-Dara Canyon; Khorog, Shakh dara River, 1500m). Turkmenia: Ashkhabad, upper Chuli River; 20 km W Ashkhabad, Furyuza). Uzbekistan: (60 km NE Tashkent, Ugamskii Mt. Range). Kirghizia (30 km S Kyzyl Kiya, Tomosha locality, 2000 m; Ornok, 1300–1900 m). Mongolia: aimaks: Selenga (25 km E Darkhan; Ero-Gol near Dulan-Khan), Central (Kerulen; Bogdo-Ula Mt. near Ulan Bator; Tola River near Lun somon); Bulgan (30 km NNE Un'ta, Selenga River), Eastern (32 km SE Salkhit Mt., Numergin-Gol River, 75 km WSW Salkhit Mt.; 7 km SE Khalkh-Gol somon; 7 km S Erentsava).

Distribution. This is a widespread Transpalaeartic species: the Madeira Islands, (Horstmann, 1980), Spain, France, Germany, Italy, Austria, Sweden, Czechia (Šedivý, 1989), Poland, the Hungary, Romania, Bulgaria (Kolarov, 1987), Greece (Crete), Turkey (Kolarov, 1995), *Russia (European part, the Caucasus, southern Siberia and southern part of the Russian Far East), *Lithuania, Moldova, *Ukraine, *Georgia, *Kazakhstan, *Tajikistan, *Turkmenia, *Uzbekistan, *Kirghizia, *Mongolia.

Biology. A parasite of *Meligethes aeneus* F. and *M. viridescens* F. (Nitidulidae) (Aubert and Jourdeuil, 1959). Emergence from April to September.

6. *Aneuclis horstmanni* Khalaim, sp. n.

(Figs. 3, 5, 11, 12)

Material. Holotype: ♀, Mongolia, Uver-Khangai aimak, near eastern shore of Lake Tatsyn-Tsagan-Nur, 2–4.VIII.1969 (Kozlov). Paratypes. Russia: 1 ♀, 1 ♂, Chita Prov., Adrianovka, steppe slopes, 2.VIII.1975 (Kasparyan). Kazakhstan: 1 ♂, Semipalatinsk Prov., 10 km E Kyzylkesek, northern foothills of western Tarbagatai, 23.VII.1983 (Belokobylskij). Mongolia: 1 ♀, 6 ♂, as holotype; 1 ♀, Bayan-Ulegei aimak: SE shore of Lake Khoton Nur, 16–17.VII.1978 (Kozlov); 1 ♀, Ikh-Dzhangarantyn-Gol River, 20 km NW Bulgan, 4–5.VII.1980 (Kerzhner); 1 ♀, Ubsunur aimak, 10 km N Khan-Khukhei-Ula Mt., 6–7.VII.1968 (Kozlov); 3 ♀, 1 ♂, Selenga aimak, Ero-Gol near Dulan-Khan, steppe, 4.VIII.1975 (Kozlov); 1 ♀, 1 ♂,

Sredne-Gobiiski aimak, 30 km N Delger-Tsogta, 22.VII.1967 (Emeljanov); 1 ♀, Sukhe Bator aimak, 50 km SSW Barun Urta, 19.VIII.1975 (Kozlov); 1 ♂, Eastern aimak, Modon-Obo Mt., 30 km ENE Tsagan Ula Mt., 25.VII.1971 (Kozlov).

Description. Female. Head roundly narrowing behind eyes (Fig. 3); length of temple distinctly less than width of eye. Hypostomal carina absent, surface at this place smooth. Upper tooth of mandible slightly longer than lower one. Clypeus smooth, sparsely punctate in apical part, flat in lateral view. Length of gena distinctly exceeding basal width of mandible. Antenna 19–21-segmented (Fig. 5); its middle and subapical segments 2.0 and 1.5 times as long as wide, respectively. Face and frons finely granulate. Vertex nearly smooth, matte. Temple smooth, shining.

Mesosoma entirely granulate; mesonotum and upper part of mesopleura also very finely and sparsely punctate. Prepectal carina reaching anterior margin of mesopleura at an angle of 30°. Sternaulus absent or occasionally in the form of rugose area. Distance between propodeal spiracle and pleural suture 1.5–2.0 times diameter of spiracle. Basal carina 0.5–0.5 times as long as apical area. Longitudinal carinae of apical area absent or developed only in posterior part.

Second recurrent vein of fore wing strongly postfurcal, non-pigmented in anterior part. Metacarpus short (Fig. 11), not reaching fore-wing apex. Brachial cell usually widely open distally, but lower section of postnervulus occasionally in the form of weakly pigmented prominence.

Tergite I more or less rounded in cross-section, smooth; petiolus before glymma occasionally finely striate. Glymma usually small, oval, occasionally forming short anterior groove. Tiridiae 1.5 times as long as wide. Ovipositor weakly and uniformly up-curved along entire length, with wide shallow dorsal subapical emargination (Fig. 12); its sheath about 1.5 times as long as tergite I.

Body black. Palpi, mandibles (except for teeth), tegulae, and legs yellow to brownish yellow; coxae occasionally darkened. Pterostigma brown. Metasoma behind tergite I yellowish brown to dark brown.

Size (mm): body length 3.5; fore-wing length 2.5; head width 0.77; length of mesosoma 1.2, width, 0.63; length of tergite I 0.8; length of tergite II 0.36, its width in anterior part 0.26; length of ovipositor sheath 1.17.

Male. Length of gena subequal to basal width of mandible. Antenna 19-segmented. Legs brown, coxae dark brown to black.

Note. Some large specimens possess a rounded glymma, and the lower section of the their postnervulus is occasionally developed in the form of a short weakly pigmented prominence; this prominence partly closes the posterior distal angle of the brachial cell. In these characters, the new species is similar to species of the genus *Diaparsis*.

Etymology. The new species is named for Dr. Klaus Horstmann, who has revised the European fauna of the subfamily Tersilochinae.

Distribution. Russia (Chita Prov.), eastern Kazakhstan, and Mongolia.

Diagnosis. The new species is clearly differs from other species in the long temple (Fig. 3), the head relatively weakly narrowing behind the eyes (Fig. 3), and 19–21-segmented antenna with strongly elongate segments (Fig. 5).

7. *Aneuclis luteola* Khalaim, sp. n. (Figs. 4, 9, 15)

Material. Holotype: ♀, Primorskii Terr., 10 km SE Chernigovka, forest, clearings, 26, 28.VIII.1998 (Belokobylskij). Paratypes. Primorskii Terr.: 4 ♀, as holotype; 3 ♀, 30 km NE Spassk, broad-leaved forest, clearings, 25 and 26.VIII.1981 (Belokobylskij); 1 ♀, environs of Spassk, forest, 31.VIII.1982 (Belokobylskij); 1 ♀, 15 km S Slavyanka, Ryazanovka, sparse oak forest, meadow, 2.IX.1987 (Belokobylskij); 1 ♀, 15 km NW Artem, valley forest, 7.IX.1988 (Belokobylskij); 1 ♀, Khasan, meadows, shrubs, oak forest, 12–14.VIII.1998 (Belokobylskij); 1 ♀, same locality and collector, 30.VIII.2003; 1 ♀, Novokachalinsk, shore of Lake Khanka, oak forest, clearings, 16.VIII.2003 (Belokobylskij). Khabarovsk Terr.: 1 ♀, Lake Udy, Adami Bay, 7.IX.1970 (Kasparyan); 1 ♀, Lake Udy, residence, 10.IX.1970 (Kasparyan).

Description. Female. Length of temple distinctly less than width of eye (Fig. 4); head roundly narrowing behind eyes (Fig. 4). Upper tooth of mandible longer than lower one. Clypeus almost entirely smooth, vaguely granulate in upper part, distinctly convex in lateral view. Length of gena equal to basal width of mandible. Antenna 17–19-segmented; its middle segments 1.5 times as long as wide, subapical segment slightly longer than wide (Fig. 9). Head granulate; granulation of temple occasionally very fine.

Mesosoma entirely and densely granulate and partly weakly punctate. Sternaulus in the form of rugose area. Distance between propodeal spiracle and pleural suture subequal to diameter of spiracle. Basal carina half as long as apical area. Apical area weakly rugose in posterior part, its longitudinal carinae occasionally indistinct.

Second recurrent vein of fore wing strongly postfurcal, mostly non-pigmented. Metacarpus not reaching fore-wing apex. Length of 1st radial abscissa exceeding width of pterostigma.

Body black. Palpi, mandibles (except for teeth), clypeus, gena near mandibular base, antennal base, tegulae, and legs, all yellow to yellowish brown. Pterostigma brown. Metasoma behind tergite I yellowish brown to brown.

Size (mm): body length 2.8; fore-wing length 2.4; head width 0.7; length of mesosoma 1.04, width, 0.54; length of tergite I 0.64, width in posterior part, 0.21; length of tergite II 0.2, its width in anterior part 0.24; length of ovipositor sheath 0.54.

Male unknown.

Distribution. Russia (southern part of the Russian Far East)

Diagnosis. The new species is closely related to *A. brevicauda*, differing in the 17–19-segmented antenna with longer segments, the presence of a yellowish spot on the gena near the mandibular base, finely granulate temple (in *A. brevicauda*, the temple is usually partly smooth), yellowish brown metasoma behind tergite I (in *A. brevicauda*, metasoma black), and not darkened coxae.

8. *Aneuclis maritima* (Thomson, 1889)

Material. A total of 37 ♀ examined. Russia: Stavropol Terr. (Shpakovskoe), North Ossetia (Vladikavkaz), Astrakhan Prov. (20 km N Lake Baskunchak), Buryatia (Selenduma Vill., Selenga River floodland). Czechia (Stav near Jichin). Moldova (Kishinev). Ukraine: Odessa Prov. (Balta; Khibriyansk Mt. Range, 5 km E Vilkov), Nikolaev Prov., Kiev Prov. (Bykovnya Vill.), Kherson Prov. (Chernomorskii Nature Reserve), Cherkassy Prov. (Kazteevskii Nature Reserve), Poltava Prov. (Aleksandrovka), Crimea (Kara Dagh; Shelkovichnoe, 24 km ENE Bakhchisarai), Kharkov Prov. (Efimovka Vill. near Volochansk), Donetsk Prov. (Severnyi Donets River; Bogorodichnoe, 6 km W Slavyanogorsk; Prishib, 10 km E Slavyanogorsk;

Krivaya Luka Vill.) Lugansk Prov. (Streltsovskaya steppe). Georgia: Aspinza Dist. (Vardzia). Kazakhstan: Uralsk Prov. (Yanvartsevo, Ural River); Aktyubinsk Prov. (Malye Barsuki desert), Vostochno-Kazakhstanskaya Prov. (Chernyi Irtysh River, 10 km W border with China; Altai, 5 km S Sekisovka).

Distribution. Sweden, Germany, *Czechia, Poland (Sawoniewicz, 1989), Hungary, Serbia, Bulgaria (Kolarov, 1987), Russia (European part and southern Siberia), Moldova, *Ukraine, *Georgia, *Kazakhstan.

Biology. Host unknown. Emergence from May to October.

9. *Aneuclis melanaria* (Holmgren, 1860)

Material. A total of 87 ♀ and 12 ♂ examined. Russia: Leningrad Prov. (Ladozhskoe Ozero Station), Stavropol Terr. (Dubovka, 20 km NE Shpakovskoe), Volgograd Prov. (Volgograd, Bakalda), Voronezh Prov. (Khoperskii Nature Reserve, Varvarino), Astrakhan Prov. (20 km N Lake Baskunchak, Bolshoi Bogdo Mt.; Kharabali; 64 km N Astrakhan; Liman Vill.), Kalmykia (30 km NNW Sarpy, Lake Tsagan Nur). Bashkiria (Kumertau Distr., Mikhailovka Vill.). Czechia (Stav, near Jichin). Hungary Szalafő-Felzsöeszter). Ukraine: Zakarpatskaya Prov. (Rakhov; Tyachev; Khust, Tisa River valley, Ivano-Frankovsk Prov. (14 km S Vorokhta, "Babina Yama" locality), Odessa Prov. ("Dunaiskie Plavni" Nature Reserve: Vilkov; Ermakov, Kubanu, and Stambulskii Islands), Kiev, Cherskassy Prov. (Kanev), Kherson Prov. (Chernomorskii Nature Reserve; Dzharylgach Island; Belozersk Distr., Aleksandrovka Vill.), Crimea (Turetskii Val, NW of Armyansk; Partizanskoe, 13 km WSW Simferopol; 20 km N Simferopol, Krasnaya Cave; Shelkovichnoe, 24 km ESE Bakhchisarai; Karagach Mt. Range). Georgia: Abkhazia (Pitsunda, Lidzava). Kazakhstan: Uralsk Prov. (Kharkin, lower Ural River), Akmola Prov. (6 km NE Lake Ylektykol, left bank of Terisakkan River; Kokshetau Mts.; SW shore of Lake Tengiz), Chimkent Prov. (Alkakol Kum Desert), Syr Daria River), Karaganda Prov. (80 km S Zhana-Ark Vill. (= Atasu), Aktau Mt.), Vostochno-Kazakhstanskaya Prov. (20 km E Buran). Turkmenia: Tashkepri). Tajikistan (Khorog, Shungan). Mongolia: Gobi-Altai aimak, 20 km W Altai (Yusun-Bulaka).

Distribution. Ireland, Spain, France, Netherlands, Germany, Denmark, Sweden, Italy (Sicily), Tunisia, Austria, Czechia (Šedivý, 1989), Poland (Sawoniewicz, 1982, 1989), Hungary, Yugoslavia, Romania,

Bulgaria (Kolarov, 1987). Turkey (Kolarov, 1995), European Russia, Moldova, *Ukraine, *Georgia, *Kazakhstan, *Turkmenia, *Tajikistan, *Mongolia.

Biology. Parasite of *Ceutorhynchus pleurostigma* Marsch. (= *assimilis* Payk.) (Curculionidae) and *Psyllioides chrysocephala* L. (Chrysomelidae) (Aubert and Jourdeuil, 1959). Emergence from May to September.

10. *Aneuclis mongolica* Khalaim, sp. n.

Material. Holotype: ♀, Mongolia, Central aimak, Zaisan locality, northern slope of Bogdo Ula Mt., 15.VI.1967 (Emeljanov).

Description. Female. Head strongly roundly narrowing behind eyes; length of temple distinctly less than width of eye. Clypeus almost entirely smooth, indistinctly granulate in upper part. Length of gena exceeding basal width of mandible. Antenna 16-segmented; its subapical segment 1.5 times as long as wide. Head granulate. Temple smooth.

Mesosoma entirely granulate. Sternaulus absent. Distance between propodeal spiracle and pleural suture about twice diameter of spiracle. Basal carina half as long as apical area.

Second recurrent vein of fore wing interstitial, almost entirely non-pigmented. Metacarpus not reaching fore-wing apex. Width of pterostigma 1.3 times length of 1st radial abscissa.

Body black. Palpi, mandibles (except for teeth), lower part of clypeus, tegulae, and legs, all brownish yellow. Antenna yellow at base, darker apically. Coxae darkened. Pterostigma pale brown.

Size (mm): body length 2.3; fore-wing length 2.0; head width 0.61; length of mesosoma 0.9; length of tergite I 0.54; length of tergite II 0.21, its width in anterior part 0.17; length of ovipositor sheath 1.4.

Male unknown.

Distribution. Mongolia.

Diagnosis. The new species clearly differs from all other species in the wide pterostigma.

11. *Aneuclis rufipleuris* Horstmann, 1980

Material. 1 ♀, Canary Islands: "Tenerife, Los Mercedes, R. Stora" (paratype, Horstmann's collection); 1 ♂, "Grand Canaria, Atalaya, 25.VI. R. Frey" (paratype, Horstmann's collection).

Biology. Host unknown. Emergence in June.

12. *Aneuclis semeonovnae* Khalaim, sp. n. (Figs. 2, 6, 11)

Material. Holotype: ♀, Mongolia, Bayan-Khognogskii aimak, Toroin-Bulak, 13 km E Tsygan-Bulak 16.VIII.1969 (Kozlov). Paratypes: 1 ♂, Tajikistan, Bazom-Dara Canyon, Bazakhman, 13.VII.1965 (Tobias); 2 ♂, as holotype.

Description. Female. Head roundly narrowing behind eyes (Fig. 2); length of temple less than width of eye (Fig. 2). Upper tooth of mandible longer than lower one. Clypeus almost entirely smooth, weakly convex in lateral view, separated from face by distinct groove. Length of gena significantly greater than basal width of mandible. Antenna 17-segmented, slender; its subapical segments nearly 1.5 times as long as wide (Fig. 6). Face and frons finely granulate and very finely and sparsely punctate. Vertex and temple smooth.

Mesosoma mostly granulate. Mesonotum very sparsely and rather indistinctly punctate over smooth (very finely punctate only in anterior part) surface. Mesopleura in upper part nearly smooth and indistinctly punctate. Mesosternum smooth. Prepectal carina reaching anterior part of mesopleura at a very acute angle. Sternaulus in the form of rugose area. Distance between propodeal spiracle and pleural suture more than 3 times diameter of spiracle. Basal carina 0.2 times as long as apical area. Longitudinal carinae of apical area well-developed, reaching transverse carina.

Second recurrent vein postfurcal, non-pigmented in anterior 0.6. Metacarpus very short, projecting slightly beyond radial vein in distal part. Distal part of medial vein non-pigmented. Length of 1st radial abscissa exceeding width of pterostigma.

Tergite I mostly smooth, its petiolus weakly striate at sides in posterior part. Tiridiae slightly longer than wide. Ovipositor distinctly thickened before apex and then strongly upcurved, finely serrate on lower side; its sheath as long as tergite I.

Body black. Palpi, mandibles, lower part of clypeus, and legs yellowish red. Coxae darkened. Antenna brown. Mandible (except for teeth), tegulae, and fore-wing base yellow. Pterostigma yellowish brown. Mesosoma dark brown.

Size (mm): body length 3.7; fore-wing length 2.9; head width 0.9; length of mesosoma 1.3, width, 0.7; length of tergite I 0.86, width in posterior part, 0.26; length of tergite II 0.36, its width in anterior part 0.32; length of ovipositor sheath 0.86.

Male. Antenna 19–20-segmented. Basal carina of propodeum about 0.4 times as long as apical area.

Etymology. The species is named for Olga Semenovna Tartakovskaya.

Distribution. Mongolia and Kazakhstan.

Diagnosis. The new species clearly differs from the congeners in the shape of the ovipositor (Fig. 13) and smooth mesonotum, and also in the combination of the following characters: antennal segments long (Fig. 6), basal carina of propodeum short; distance between propodeal spiracle and pleural carina more than 3 times diameter of spiracle; and ovipositor sheaths as long as abdominal tergite I.

13. *Aneuclis stepposa* Khalaim, sp. n.

Material. Holotype: ♀, Mongolia, Kobdos aimak, 40 km SSW Uencha, 26.VI.1960 (Kerzhner). Paratype: ♀, Mongolia, Kobdos aimak, Yolkhon area, 20 km S Altai, 24.VI.1980 (Kerzhner).

Description. Female. Length of temple distinctly less than width of eye; head strongly roundly narrowing behind eyes. Upper tooth of mandible longer than lower one. Clypeus almost entirely smooth, with several punctures in upper part, indistinctly granulate. Length of gena exceeding basal width of mandible. Antenna 15-segmented, weakly club-shaped (segments thickening toward antennal apex); 4th and 5th segments twice, and subapical 1.5 times as long as wide. Face and frons finely granulate. Vertex and temple smooth.

Mesosoma finely granulate. Sides of mesonotum and mesosternum smooth. Sternaulus absent. Distance between propodeal spiracle and pleural suture 2–3 times diameter of spiracle. Basal carina indistinct in anterior part, 0.66 times as long as apical area. Longitudinal carinae of apical area well-developed, reaching transverse carina.

Second recurrent vein postfurcal, mainly non-pigmented. Metacarpus short, not reaching fore-wing apex. Length of 1st radial abscissa equal to width of pterostigma.

Tergite I smooth at sides. Glymma small and rounded. Tiridiae 1.5 times as long as wide. Ovipositor

short, distinctly upcurved before apex; its sheath nearly as long as tergite I.

Body black. Palpi, mandibles (except for teeth), tegulae, and legs, all yellowish brown to brown; coxa darkened. Lower part of clypeus reddish brown. Pterostigma brown, occasionally with yellowish spot. Metasoma dark brown to black.

Size (mm): body length 2.2; fore-wing length 1.86; head width 0.6; length of mesosoma 0.86, width, 0.46; length of tergite I 0.5, width in posterior part, 0.16; length of tergite II 0.19, its width in anterior part 0.19; length of ovipositor sheath 0.47.

Male unknown.

Distribution. Mongolia.

Diagnosis. The new species is closely related to *A. brevicauda* and differs from it in the 15-segmented antenna with longer segments and in the entirely smooth temple, vertex, and abdominal tergite I.

14. *Aneuclis stigmata* Khalaim, sp. n. (Figs. 7, 14)

Material. Holotype: ♀, Kazakhstan, Uralsk Prov., Aktau locality, 10 km SE Mirgorodka, steppefied gullies along cretaceous slopes, 3.V.1986 (Kasparyan). Paratypes. Russia: 2 ♀, Volgograd Prov., Lake Elton, saltwort-wormwood semidesert, 24.VI.1986 (Kasparyan); 1 ♀, Volgograd, Gorodishche, steppefied gullies and forest belts, 25.VI.1977 (Kasparyan); 2 ♀, Volgograd, Bakalda, steppefied gullies with spurge, 23.VI.1977 (Kasparyan); 1 ♀, Voronezh Prov., Khoperskii Nature Reserve, Varvarino, floodland, 29.VI.1977 (Kasparyan); 1 ♀, same locality, western cordon, Dubovaya Khata, 3.VII.1977 (Kasparyan); 1 ♀, same locality, W Varvarino, forest clearings turned into steppe, 4.VII.1977 (Kasparyan); 5 ♀, 1 ♂, Astrakhan Prov., Kharabali, 4–6.VIII.1974 (Kostyukov); 1 ♀, Kalmykia, 20 km SW Tsagan-Aman, 21.V.1986 (Kasparyan); 1 ♀, Saratov, 8.VI.1898 (Collection of Kokuiev); 1 ♀, Altai Prov., 4 km from Tashanta along road on Yustus River, deserted steppe, 20.VI.1977 (Richter); 1 ♀, Tuva, Erzin, Steppe, 15.VIII.1964 (Kozlov); 2 ♀, Chita Prov., Lake Ivan-Ozero, leaved forest with clearings, 30.VII.1975 (Kasparyan); 1 ♀, Buryatia, Selenduma Vill., Selenga River floodland, 23.VI.1971 (Kasparyan); 2 ♀, 1 ♂, as holotype; 1 ♀, Uralsk Prov., Aksaiskii Distr., SE Mirgorodka Vill., cretaceous hills, motley-grass steppe, 2.V.1986 (Kasparyan); 1 ♀, same locality, Dzhanybek, steppe and clearings of forest belts, 20.VI.1977 (Kasparyan); 3 ♀, same locality, Kharkin, lower Ural River, 11, 31.VII

and 2.VIII.1951 (Rudolf); 2 ♀, same locality, 25, 29.VII.1951 (Popov); 2 ♀, Vostochno-Kazakhstanskaya Prov., 10 km SSE Przhevalsk, Saur Mt. Range, forest on Kendyrylk River, 26.VII.1983 (Belokobylskij); 1 ♀, Semipalatinsk Prov., 10 km E Kyzylkesek, northern spurs of western Tarbagatai, 23.VII.1983 (Belokobylskij); 1 ♀, Karaganda Prov., 40 km S Zhana-Ark Vill. (= Atasu), Taup-Monaka River floodland, by mowing, 28.VIII.1959 (Tobias); 1 ♀, same locality, Samen Kum Desert, near grave of Sengir-Bai, 29.V.1962 (Kerzhner); 1 ♀, same locality, Zhetokonyr Desert, 10 km, N Ak-Kense, 28.V.1982 (Kerzhner). Tajikistan: 1 ♀, Lyangarkisht, 2800 m, motley grass, 6.VIII.1972 (Tanasijchuk). Mongolia: 1 ♀, Ubsunur aimak, Lake Ubsu-Nur, 50 km E Ulangom, 6.VIII.1970 (Kerzhner); 2 ♀, Kobdos aimak, 15 km S Bulgan, 29.VII.1970 (Kerzhner) (1 ♀, SIZK); 1 ♀, same locality, Nariin-Bulak spring, Ikh-Khavtgiyn-Nuru Range, 24.VII.1970 (Kerzhner); 1 ♀, same locality, Bodonchin-Gol River, 12 km S Altai, floodland meadows, willow grove, 22.VII.1970 (Kerzhner); 1 ♀, same locality, 10 km N Uenchu, 28.VII.1970 (Kerzhner); 3 ♀, same locality, Yorkhon locality, 20–25 km S Altai, 22–24.VI.1980 (Kerzhner); 2 ♀, same locality, same date, (Kozlov); 1 ♀, Dzabkhan aimak, Gantsyn-Daba Pass, 15 km SSE Ulyasutai, 12.VIII.1970 (Kerzhner); 1 ♀, Gobi-Alaiskii aimak, 15 km WNW Dzakhoi, 24–26.VIII.1970 (Kerzhner); 1 ♀, Khubsugul aimak, 15 km SE Toson-Tsegel, Selenga River, 25.VII.1975 (Narchuk); 1 ♀, Southern Gobi aimak, Khongoryn-Els, 60 km WNW Baian-Dalai, 30,31.1967 (Zaitsev); 1 ♀, Uver-Khangai aimak, near eastern shore of Lake Tatsyn-Tsagan-Nur, 2–4.VIII.1969 (Kerzhner); 1 ♀, Selenga aimak, 40 km WNW Dzun-Buren, Lake Tsagan-Nur, feather grass steppe, 28.VII.1975 (Sugonjaev); 1 ♀, same locality, 13 km E Darkhan, motley-grass steppe, 30.VII.1975 (Sugonjaev); 2 ♀, Khentei aimak, 12 km N Gal-Shir, 30.VII.1971 (Kozlov); 2 ♀, same locality, 15 km S Tsenkher-Mandala, steppe, 4–5.IX.1975 (Kozlov); 1 ♀, East Gobi aimak, 25 km NE Tal-Khongoryn-Khuduk, 30.VI.1971 (Kozlov); 1 ♀, same locality, 23 km WSW Baian-Munkh, 3.VII.1971 (Kozlov); 1 ♀, same locality, 25 km NNW Khuvsgel, 2.VIII.1971 (Kozlov); 1 ♀, 1 ♂, same locality, 40 km ESE Sain-Shanda, semidesert, 15.VIII.1975 (Kozlov); 2 ♀, same locality, 15 km E Dzun-Baian, 15.VIII.1975 (Narchuk); 8 ♀, same locality, 40 km W Erdene, 14.VIII.1975 (Sugonjaev, Kozlov) (2 ♀ in SIZK); 1 ♀, Eastern aimak, 32 km SE Mt Salkhit, Numergin-Gol River, 9.VIII.1976 (Kozlov).

Description. Female. Length of temple distinctly less than width of eye; head strongly roundly narrowing behind eyes. Upper tooth of mandible longer than lower one. Clypeus smooth, very finely granulate and sparsely punctate in apical part, flat in lateral view. Length of gena slightly exceeding basal width of mandible. Antenna 16–17-segmented (occasionally, 15- or 18-segmented); 4th and 5th segments at least twice as long as wide; subapical segments much longer than wide (Fig. 7). Face and frons finely granulate. Vertex very finely granulate or smooth, usually indistinctly punctate. Temple usually entirely smooth.

Mesosoma usually entirely granulate and mostly finely punctate. Sternaulus absent. Distance between propodeal spiracle and pleural suture 1.5–2.0 times diameter of spiracle. Basal carina 0.33–0.5 times as long as apical area. Apical area in posterior part frequently rugulose; longitudinal carinae of apical area well-developed, usually reaching transverse carina.

Second recurrent vein postfurcal, non-pigmented in anterior two thirds. Metacarpus short, not reaching fore-wing apex. Length of 1st radial abscissa slightly exceeding width of pterostigma.

Tergite I mostly smooth, petiolus weakly striate laterally in posterior part. Tiridiae slightly longer than wide. Ovipositor weakly upcurved along entire length and more strongly so before apex, with at least 2 distinct subapical teeth (Fig. 14), occasionally slightly serrate on ventral surface; its sheath slightly longer than tergite I.

Body black. Palpi, mandibles (except for teeth), tegulae, and legs reddish yellow. Trochanters and coxae darkened. Lower part of clypeus reddish brown. Antennal base yellowish brown. Pterostigma yellow to brownish yellow, some veins usually also yellow. Metasoma dark brown to black, occasionally with yellowish brown lateral spots.

Size (mm): body length 3.5; fore-wing length 2.8; head width 0.86; length of mesosoma 1.24, width, 0.67; length of tergite I 0.83, width in posterior part, 0.26; length of tergite II 0.24; length of ovipositor sheath 1.1.

Male. Length of gena slightly less than basal width of mandible. Antenna 18–19-segmented, gradually narrowing toward apex, with segments shorter than those in female.

Distribution. Russia (southeastern part of European Russia and southern Siberia), Kazakhstan, Mongolia.

Diagnosis. The new species clearly differs from closely related *A. melanaria* in the presence of a pale pterostigma.

15. *Aneuclis tarbagataica* Khalaim, sp. n.

Material. Holotype: ♀, Kazakhstan, Semipalatinsk Prov., 45 km ENE Tarbagatai, Tarbagatai Mt. Range, 21.VII.1983 (Belokobylskij).

Description. Female. Head strongly roundly narrowing behind eyes; length of temple distinctly less than width of eye. Clypeus smooth, very finely granulate and sparsely punctate in apical part; clypeus flat in lateral view. Length of gena slightly exceeding basal width of mandible. Antenna 19-segmented; 3rd and 4th antennal segments 2.5 times as long as wide; subapical segments 1.5 times as long as wide. Face and frons finely granulate and very finely and sparsely punctate.

Mesosoma granulate and mostly finely punctate. Sternaulus absent. Distance between propodeal spiracle and pleural suture equal to diameter of spiracle. Basal carina 0.17 times as long as apical area. Apical area rounded in anterior part.

Second recurrent vein postfurcal, non-pigmented in anterior part. Metacarpus not reaching fore-wing apex.

Tergite I very long, with distinct dorsolateral carinae; its petiolus partly striate on dorsal side, mostly smooth laterally. Tiridiae elongate, very shallow. Ovipositor weakly and uniformly upcurved along entire length; its sheath twice as long as tergite I.

Body black. Palpi, mandible (except for teeth), tegulae, and legs brownish yellow. Coxae darkened. Lower part of clypeus reddish brown. Antenna dark brown. Pterostigma brown.

Size (mm): body length 3.9; fore-wing length 3.1; head width 0.95; length of mesosoma 1.5, width, 0.75; length of tergite I 1.0; length of tergite II 0.43, its width in anterior part 0.33; length of ovipositor sheath 2.0.

Male unknown.

Distribution. Kazakhstan.

Diagnosis. The new species is similar to *A. maritima* in the long sheath of the ovipositor and the postfurcal 2nd recurrent vein and differs from it in the sculpture of the abdominal tergite I, number of the antennal segments, and body size.

16. *Aneuclis unica* Khalaim, sp. n.

Material. Holotype: ♀, Russia, Chita Prov., 50 km N Kalga, Kozlovo, birch forest, steppe forest edges, 17.VII.1975 (Kasparyan). Paratypes: 2 ♀, Mongolia, Eastern Gobi aimak, 40 km W Erdene, 14.VIII.1975 (Kozlov).

Description. Female. Head strongly roundly narrowing behind eyes; length of temple less than width of eye. Upper tooth of mandible longer than lower one. Clypeus mostly smooth, very finely granulate in apical part, matte, sparsely punctate. Length of gena subequal to basal width of mandible. Antenna 18-segmented; all antennal segments significantly elongate. Face and frons finely punctate over finely granulate surface; punctures on frons distinctly denser. Vertex nearly matte, smooth. Temple smooth and shining. Vertex and temple occasionally very finely and sparsely punctate.

Mesonotum rather densely punctate over granulate surface (punctuation sparser at sides). Mesopleura and propodeum granulate, occasionally more or less distinctly punctate. Sternaulus in the form of weakly rugose area or absent. Distance between propodeal spiracle and pleural suture 3–4 times diameter of spiracle. Basal carina 0.2–0.25 times as long as apical area. Longitudinal carinae of apical area occasionally indistinct in anterior part, reaching or not reaching transverse carina.

Second recurrent vein postfurcal, non-pigmented in anterior part. Metacarpus very short, projecting slightly beyond radial vein in distal part. Length of 1st radial abscissa exceeding width of pterostigma.

Tergite I mostly smooth, its petiolus weakly striate at sides in posterior part. Tiridiae slightly longer than wide. Ovipositor usually with 2 weak dorsal subapical teeth, uniformly and weakly upcurved along entire length; its sheath 1.2 times as long as tergite I.

Body black. Palpi, mandible (except for teeth), tegulae, fore-wing base, and legs yellow (coxae brown, hind femur occasionally brownish). Lower part of clypeus reddish yellow. Scape and pedicel yellowish, antennal flagellum pale at base and weakly darkened toward apex. Pterostigma mainly yellow, occasionally partly brownish yellow. Metasoma dark brown behind segment I, partly yellowish brown on ventral side in holotype.

Size (mm): body length 3.75; fore-wing length 3; head width 0.93; length of mesosoma 1.4, width, 0.77;

length of tergite I 0.86, width in posterior part, 0.3; length of tergite II 0.32; length of ovipositor sheath 1.08.

Male unknown.

Distribution. Russia (Chita Prov.) and Mongolia.

Diagnosis. The new species is closely related to *A. semeonovnae* and differs from it in the mesonotum densely punctate over the granulate surface and in the ovipositor uniformly upcurved along entire length (in *A. semeonovnae* sp. n., the apex of the ovipositor is strongly upcurved, Fig. 13).

Genus *SATHROPTERUS* Förster, 1869

Type species *Thersilochus pumilis* Holmgren, 1860.

The genus is morphologically similar to *Aneuclis* and clearly differs from it in the absence of the 2nd recurrent vein and in the apically undulate ovipositor (Fig. 17).

Sathropterus pumilis (Holmgren, 1860) (Fig. 17)

Material. A total of 84 ♀ and 2 ♂ examined. *Russia: Leningrad Prov. (Ladozhskoe Ozero Station); Novgorod Prov. (20 km NW Pestovo, Tychkino Vill.), Smolensk Prov. ("Smolenskoe Poozer'e" National Park, Przhevalskoe), Moscow Prov. (Ivanteevka), Kaluga Prov.) near Kaluga, Vyrka-Sivkovo), Krasnodar Terr. (Krasnaya Polyana, 1850 m, Krasnoaleksandrovskii aul, Ame River valley), North Ossetia (Vladikavkaz), Stavropol Terr. (Shpakovskoe; 20 km NE Shpakovskoe, Dubovka), Chechnya (Vedeno), Chuvashia (near Cheboksary, Kuvshinka), Khakassia (Abakan), Chita Prov. (90 km W Shilka Station, Savinskii Vill., Ingoda River; Dauriskii Nature Reserve; Ononsk Distr.: Nizhnii Tsasychei Vill; Ozon-Cholon Mountain Range), Jewish Autonomous Terr. (Amurzet), Primorskii Terr. (Spassk; 20 km NW Spassk; Novokachalinsk). Italy (Pizzighettone). Lithuania (Kaunas). *Belarus: Brest Prov. ("Belovezhskaya Pushcha" Nature Reserve). Moldova (Kishinev; Kagul). *Ukraine: Zakarpatskaya Prov. (Karpatskii Nature Reserve, 1500–1700 m; Zaporedillya Vill. on Kuk Mt., 1200–1300 m; Tyachev; Khust, Tisa River valley), Kiev (Novoselki), Crimea (Izobil'noe Vill. near Alushta), Nikolaevskaya (Dmitrovka Vill., 15 km E Ochakov), Poltava Prov. (Mirgorod), Rovno Prov. (E of Kuznetsovsk). *Georgia: Abkhazia (Gumistinskii Reserve, 500 m), Adigeni, Tsagveri, Borzhomi, (Mgetamze, 1800 m). *Tajikistan (23 km SE Tajikobad, Ganshiob Mt.; above Anzob Pass, Ziddakh Vill.,

2300–2800 m; Fanskie Mts., 14 km above Pasrud Vill., 400 m). *Uzbekistan (Kyzyl Kum Desert). Kirghizia (Susamyr Tau Mt. Range, Kekemeran River valley; 80 km W Naryn, Naryn River valley; 70 km W Dzhahalabad, northern spurs of Ferghana Mt. Range, 1750–2000 m). *Mongolia: Kobdos aimak (Altai, lower Bodonchin-Gol River, Selenga aimak (13 km E Bayan-Gol).

Distribution. This widespread species occurs in the Palaearctic Region in Europe, the Caucasus, Middle Asia, Mongolia, southern Siberia, and the Russian Far East. It was also recorded in North and South America, South Africa, and Australia, where it was probably introduced from Europe (Horstmann, personal communication: in Gauld, 1984).

Biology. Host unknown. Emergence from June to October.

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REFERENCES

1. Aubert, J.F., and Jourdehuill, Nouvelle description et biologie quelques Ichneumonides appartenant aux genres *Aneuclis* Först., *Usurgus* Först. et *Thersilochus* Holm., *Rev. Pathol. Veget. Entomol. Agr.* (1958), 1959, vol. 38, no. 4, pp. 175–193.
2. Gauld, I.D., An Introduction to the Ichneumonidae of Australia, *Brit. Mus. Nat. Hist.*, 1984, no. 895, pp. 1–413.
3. Holmgren, A.E., Försök till uppställning och beskrifning af de i Sverige funna ophionider (Monographia Ophionidum Sueciae), *K. Svensk. Vet. Akad. Handl.*, N. F., 1860, vol. 2, no. 8, pp. 1–158.
4. Horstmann, K., Revision der europäischen Tersilochinen I (Hymenoptera, Ichneumonidae), *Veröff. Zool. Staatsamml. München*, 1971, vol. 15, pp. 45–138.
5. Horstmann, K., Tersilochinae von Makaronesischen Inseln (Hymenoptera, Ichneumonidae), *Entomofauna*, 1980, vol. 1, no. 11, pp. 211–216.
6. Horstmann, K., Revision der europäischen Tersilochinen II (Hymenoptera, Ichneumonidae), *Spixiana*, 1981, suppl. 4, pp. 1–76.
7. Jussila, R., Ichneumonidae from Hardangervidda, Fauna of Hardangervidda, *Zool. Mus., Univ. Bergen*, 1973, vol. 2, pp. 1–50.

8. Kasparyan, D.R., Subfamily Tersilochinae, *Opređelitel' nasekomykh Evropeiskoi chasti SSSR. Pereponchatokrylye* (Key to Insects of the European USSR. Hymenoptera), Leningrad: Nauka, 1981, vol. 3, part 3, pp. 351–368.
9. Kolarov, J.A., A Study on Bulgarian Tersilochinae (Hymenoptera, Ichneumonidae), *Acta Zool. Bulg.*, 1987, vol. 33, pp. 26–33.
10. Kolarov, J.A., A Catalogue of the Turkish Ichneumonidae (Hymenoptera), *Entomofauna*, 1995, vol. 16, no. 7, pp. 137–188.
11. Sawoniewicz, J., Ichneumonidae (Hymenoptera) of Warsaw and Mazovia, *Memorabilia Zool.*, 1982, vol. 36, pp. 5–40.
12. Sawoniewicz, J., Ichneumonidae (Hymenoptera) of Moist Meadows on the Mazovian Lowland, *Memorabilia Zool.*, 1989, vol. 43, pp. 249–263.
13. Šedivy, J., Enumeratio Insectorum Bohemoslovakiae, Check List of Czechoslovak Insects III (Hymenoptera), *Acta Faun. Entomol. Mus. Nat. Pragae*, 1989, vol. 19, pp. 109–134.
14. Thomson, C.G., Försök till gruppering och beskrifning af arterna inom släktet Porizon (Grav.), *Opusc. Entomol.*, 1889, fasc. 13, pp. 1354–1400.
15. Townes, H., The genera of Ichneumonidae, *Mem. Amer. Entomol. Inst.*, 1971, vol. 17, part 4, pp. 1–372.
16. Yu, D. and Horstmann, K., Catalogue of World Ichneumonidae (Hymenoptera), *Mem. Amer. Entomol. Inst.*, 1997, vol. 58, part 2, pp. 764–1558.