Published November 26, 2003

Klapalekiana, **39**: 1-30, 2003
ISSN 1210-6100

Revision of genera *Gyratogaster*, *Leianisorhynchus* and *Altonomus* (Coleoptera: Curculionidae: Entiminae: Cyphicerini)

Revize rodů *Gyratogaster*, *Leianisorhynchus* a *Altonomus* (Coleoptera: Curculionidae: Entiminae: Cyphicerini)

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Taxonomy, systematics, Coleoptera, Curculionidae, Entiminae, new species, new combinations, keys, check-list, Palaearctic region, Turkey, Syria, Lebanon, Israel, Armenia

Abstract. The genera *Gyratogaster* K. Daniel et J. Daniel, 1903 and *Leianisorhynchus* Pic, 1905 are transferred from the tribe Omiini Shuckard, 1840 to Cyphicerini Lacordaire, 1863 and listed near to the genus *Altonomus* Desbrochers, 1907 in the subtribe Mylacorrhinina Reitter, 1913. All three genera are redescribed. All species from these genera are redescribed, illustrated and listed in keys and in the check-list. Two new species are described, *Gyratogaster podlussanyi* sp. n. from Turkey and *Altonomus jelineki* sp. n. from Israel. *Gyratogaster comosa* K. Daniel et J. Daniel, 1903 is removed from synonymy with *G. larinoides* (Reitter, 1896) and reinstated as a valid species. New combinations are proposed: *Leianisorhynchus wittmeri* (Pesarini, 1971) (from *Gyratogaster*), *Altonomus modestus* (Iablokoff-Khnzorian, 1957) and *A. vernalis* (Iablokoff-Khnzorian, 1957) (from *Mylacorrhina* Reitter, 1913). Holotypes of *Gyratogaster larinoides* (Reitter, 1896) and *Altonomus villosus* (Reitter, 1906) and lectotype of *Altonomus reitteri* (Stierlin, 1884) are designated. Males of *Gyratogaster rufithorax* Pesarini, 1975 and *G. podlussanyi* sp. n. are the first males of the genus *Gyratogaster* to be described. Genitalia of both sexes are described and illustrated in all three genera for the first time.

INTRODUCTION

Gyratogaster K. Daniel et J. Daniel, 1903, *Leianisorhynchus* Pic, 1905 and *Altonomus* Desbrochers, 1907 belong to recondite genera and species of weevils. Species of these three genera are extremely rare, and nine from ten species have been known only from the type material up to this date. The majority of species were all but forgotten since the time of description and listed only in catalogues. I have studied an extensive material of weevils from Turkey, Syria, Israel and Armenia and I have seen only a very limited material of these taxa. Moreover, nothing is known about the bionomy of these genera. All recent material was collected exclusively beneath stones (S. Benedikt and A. Podlussány, pers. comm.). No specimens were collected by sifting of plant roots or by night sweeping in the same habitats, although it is easy to collect related genera such as *Psallidium* Herbst, 1795 and *Strophomorphus* Seidlitz, 1867 in that way.

The aim of this paper is to correct former errors in the specific as well as generic classification of this group of genera. All these three very similar and related genera are herein placed to the same tribe. All available type material was studied; all genera and species are redescribed and illustrated. Male and female genitalia are illustrated here for the first time.

HISTORY

Only several single species descriptions of *Gyratogaster*, *Leianisorhynchus* and *Altonomus*, without any further synthesizing study have appeared until now. Taxonomic position of these three genera and species included changed several times. I thus take the oportunity to summarize all important data in the studies of these three genera. They are presented chronologically and separately for each genus:

Gyratogaster K. Daniel et J. Daniel, 1903

1896 – Reitter described the first species of *Gyratogaster* under the genus *Arammichnus* Gozis, 1882 as *A. larinoides*, but noted "von *Arammichnus* etwas abweichend, hat vielleicht ein besonderes Genus zu bilden".

1903 – K. and J. Daniel described *Gyratogaster* as a new genus, based on a species named by them as *G. comosus*, ignoring or being not aware of Reitter's description of the very different *A. larinoides*. Both species have been listed as the only species by all subsequent authors. The Daniels placed that genus near to *Otiorhynchus* Germar, 1824.

1913 – Reitter placed the genus *Gyratogaster* in the tribe Mylacini Reitter, 1913 (now Omiini Shuckard, 1840) in his key to the genera of Curculionidae.

1943 – Voss described another species of the genus, *G. discretus*, and placed *Gyratogaster* in the tribe Peritelini Lacordaire, 1863.

1975 – Pesarini described a new species, *G. rufithorax*, and provided the first brief key to that genus, containing four species: *G. larinoides*, *G. discretus*, *G. wittmeri* (see genus *Leianisorhynchus*) and *G. rufithorax*. He simultaneously placed the genus near *Hlavena* Reitter, 1913 in the tribe Omiini.

1999 – Alonso-Zarazaga & Lyal placed *Gyratogaster* in the tribe Omiini, with the type species *Gyratogaster comosa* K. Daniel et J. Daniel, 1903 = *Otiorhynchus larinoides* Reitter, 1896.

Leianisorhynchus Pic, 1905

1905 – Pic described the new genus and species *Leianisorhynchus brunnescens*. He placed it into Otiorhynchini near the genus *Mylacus* Boheman, 1843. Since the time of description, this genus was omitted in all literature except of catalogues and was practically unknown.

1913 – Reitter did not mention this genus in his key to the genera of Curculionidae.

1971 – Pesarini described a second species of this genus under the generic name *Gyratogaster* as *G. wittmeri.*

1999 – Alonso-Zarazaga & Lyal listed *Leianisorhynchus* in the tribe Omiini, with the type species *Leianisorhynchus brunnescens* Pic, 1905.

Altonomus Desbrochers, 1907

1884 – Stierlin described the first species of the genus under the generic name *Mylacus* as *M. reitteri.*

1906 – Reitter transferred *M. reitteri* to his newly described genus *Desbrochersella* and contemporaneously described a second species of the genus, but in the genus *Mylacus* as *M. villosus*.

1907 – Desbrochers described a new genus and species from Adana as *Altonomus demaisoni.*

1913 – Reitter described a new genus named *Mylacorrhina*, containing two species: *M. reitteri* (from *Desbrochersella*) and *M. villosus* (from *Mylacus*). He placed this genus in the tribe Ptochini Reitter, 1913 (now Cyphicerini Lacordaire, 1863).

1937 – Lona listed the genus *Altonomus* in the tribe Holcorrhinini, containing the only species *A. demaisoni*. Contemporaneously he included *Mylacorrhina* in the tribe Ptochini (now Cyphicerini), containing two species: *M. reitteri* and *M. villosus*.

1950 – Solari, based on the study of type material, synonymized *Mylacorrhina villosa* and *Altonomus demaisoni*, giving *Altonomus* the generic priority and *villosus* the species priority. He included two species into the genus: *A. villosus* and *A. reitteri.*

1957 – Iablokoff-Khnzorian described two new species from Armenia under the names *Mylacorrhina vernalis* and *M. modesta.*

1970 – González transferred *Altonomus reitteri* back to the genus *Desbrochersella* in his revision of that genus.

1973 – Angelov transferred *Desbrochersella reitteri* and *Altonomus villosus* back to *Mylacus.*

1999 – Alonso-Zarazaga & Lyal included the genus *Altonomus* in the tribe Cyphicerini, subtribe Mylacorrhinina Reitter, 1913, with the type species *Altonomus demaisoni* Desbrochers, 1907 = *Mylacus villosus* Reitter, 1906.

ACRONYMS

APO – coll. Attila Podlussány, Budapest; CPE – coll. Carlo Pesarini, Milano; DEI – coll. Deutsches Entomologisches Institut, Eberswalde; GOS – coll. Giuseppe Osella, L'Aquila; HNHM – coll. Természettudományi Múzeum, Budapest; JFR – coll. Jan Fremuth, Hradec Králové; MNHU – coll. Museum für Naturkunde der Humboldt Universität, Berlin; NMB – coll. Naturhistorisches Museum, Basel; NMP – coll. Národní muzeum, Praha; RBO – coll. Roman Borovec, Nechanice; SBE – coll. Stanislav Benedikt, Starý Plzenec; SMT – coll. Staatliches Museum für Tierkunde, Dresden; OVO – coll. Oldřich Vořišek, Kladno; TAU – coll. Tel Aviv University.

r. e. – rostrum excluded; / – separation of data of different labels; [ ] – remarks and comments of the author.

TAXONOMIC PART

The genera *Gyratogaster* and *Leianisorhynchus* are currently placed in the tribe Omiini Shuckard, 1840 (Alonso-Zarazaga & Lyal 1999). This tribe can be distinguished by a set of more or less reliable characters, but the most reliable character involves tarsal claws that are coalesced in basal half. This character (claws free or coalesced) is used in the subfamily Entiminae exclusively for the separation of tribes. Having studied material of all known Palaearctic genera of Omiini I did not find any exception to this rule except all species of the genera *Gyratogaster* and *Leianisorhynchus* that possess free tarsal claws. Only in several species of *Gyratogaster* claws are coalesced at their very base (visible only at magnifications 200x or higher). Such claws have to be also assumed as free in comparison with claws coalesced in the whole basal half in all other taxa of Omiini. This character has been already stated in the descriptions of both genera: Daniel & Daniel (1903) stated: "Gyratogaster unterscheidet sich von den Mylacus-Arten durch freie Klauen". Pic (1905) also clearly mentioned "ongles libres"

in his description of *Leianisorhynchus*. Another important character in which *Gyratogaster* and *Leianisorhynchus* differ from all other genera of Omiini is the rostrum with large frons. Based on these important characters, these two genera have to be transferred from the tribe Omiini to the tribe Cyphicerini Lacordaire, 1863. Based on the characteristic form of rostrum with large frons, they are moreover very close to the genus *Altonomus*. These three genera constitute the subtribe Mylacorrhinina Reitter, 1913, which is distinguishable from other subtribes by the absence of scales on the dorsal side of body and by the frons being curved ventrally, slightly angular in lateral view, shiny, large, and exceeding antennal insertion. Following these tribal and subtribal characters, I include into these three genera all species described as *Gyratogaster*, *Leianisorhynchus*, *Altonomus* and *Mylacorrhina*, and also two species described as *Mylacus* and one species described as *Arammichnus*. The three genera can be separated by the following set of characters:

1. Apex of protibia in females gently enlarged outside, in males rounded (Figs 43, 44). Rostrum at the same level as head (Fig. 37). Apodeme of sternum 8 in females terminated inside of plate, not creating margo basalis (Figs 34, 38, 46, 50). Smaller species, body length 2.4-3.4 mm. ..... *Altonomus* Desbrochers
– Apex of protibia in females strongly and in males gently enlarged outside (Figs 15, 16). Rostrum separated dorsally from rest of head by shallow or deep, transversal depression (Figs 14, 25). Apodeme of sternum 8 in females creating distinct margo basalis (Figs 5, 9, 18, 26, 30). Larger species, body length 3.3-6.8 mm. 2
2. Frons smaller, reaching or only gently exceeding posterior margin of pit-shaped scrobes (Figs 4, 8, 13, 21). Rostrum separated from head by shallow transversal depression (Fig. 14). Nodulus of spermatheca short, about as long as ramus, strikingly shorter than cornu (Figs 6, 10, 19). Body length 3.3-6.8 mm. ..... *Gyratogaster* K. Daniel et J. Daniel
– Frons extremely large, almost reaching anterior margin of eyes (Figs 24, 29). Rostrum separated from head by deep transversal depression (Fig. 25). Nodulus of spermatheca extremely long, strikingly longer than ramus, about as long as cornu (Figs 27, 31). Body length 3.9-6.8 mm. ..... *Leianisorhynchus* Pic

Gyratogaster K. Daniel et J. Daniel, 1903

Gyratogaster K. Daniel et J. Daniel, 1903: 319.
Gyratogaster: Pesarini, 1971: 145; Pesarini, 1975: 44; Alonso-Zarazaga & Lyal, 1999: 166.

Redescription. Body length (r. e.): 3.3-6.8 mm.

Body blackish, sometimes pronotum and rostrum dark brownish, legs and antennae brownish. All setae piliform, on elytra erect, long and dense, in some species combined with adherent setae. Tibiae with long and erect setae.

Rostrum wider than long or about as wide as long, widest at base, with concave sides. Epifrons very narrow. Frons large, shiny, curved ventrally, slightly angular in lateral view, gently exceeding antennal insertion. Epistome not differentiated. Scrobes in dorsal view completely visible, opened; in lateral view short, strongly enlarged, ventral margin directed below ventral margin of eye. Rostrum in lateral view vaulted, separated dorsally from rest of head by shallow transversal depression. Eyes small, dorsaly placed, convex, gently protruding from outline of head (Figs 4, 8, 13, 14, 21).

Antenna slender. Scape reaching or gently exceeding pronotal anterior border, straight, visibly thickened only in short terminal part. Funicle slender, antennomeres 1 and 2 longer

than wide, antennomeres 6 and 7 wider than long. Antennomeres including scape more robust in males than in females.

Pronotum wide, widest at or behind midlength, evenly vaulted, without any sculpture, sparsely or densely punctured. Pronotum in males more robust than in females (Figs 3, 7, 11, 12, 20).

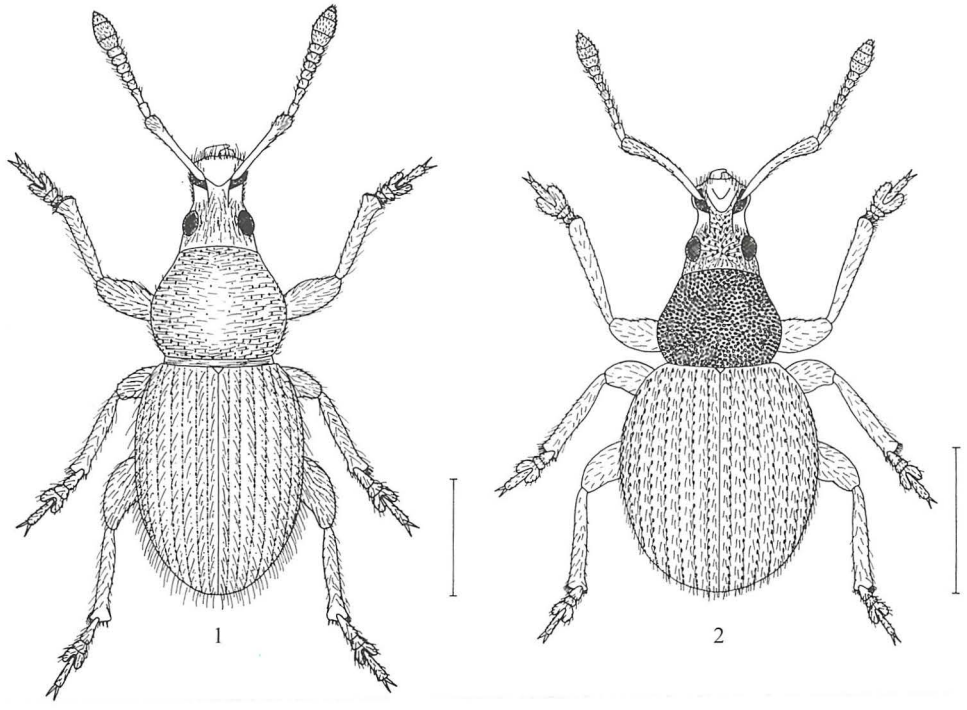
Procoxa semiglobular, in males situated at midlength of pronotum but in females nearer to anterior than posterior border of pronotum. Coxal cavities in males almost contiguous, in females separated.

Scutellum small, triangular, badly visible.

Elytra oval or oblongly oval, more slender in males than in females, with punctate striae and flat, wide intervals. Base feebly arched. Elytra in males narrower and shorter than in females (Figs 3, 7, 11, 12, 20).

Mesocoxa semiglobular, mesosternal process narrow, in males about 0.25 times, in females almost 0.5 times as wide as diameter of mesocoxa. Metacoxa transversal, metasternal process narrower than transversal diameter of metacoxa, straight.

All femora with exception of *G. discretus* inermis. Apex of protibia in females strongly, in males only gently enlarged outside, in both sexes strongly enlarged inside, rounded, with a



Figs 1-2. Habitus of holotype, dorsal view: 1 – *Gyratogaster podlussanyi* sp. n.; 2 – *Altonomus jelineki* sp. n. Scale = 1.00 mm.

Obr. 1-2. Celkový vzhled holotypu, pohled svrchu: 1 – *Gyratogaster podlussanyi* sp. n.; 2 – *Altonomus jelineki* sp. n. Měřítko = 1,00 mm.

fringe of short, yellowish or brownish setae (Figs 15, 16). Mesotibia in both sexes with short or long inner spine. Metatibial corbel opened with visible sharp longitudinal ridge along whole length, dividing corbel into two parts. Tarsi long and slender; tarsomere 3 bilobed, strikingly wider than previous one; ungular tarsomere longer than tarsomere 3. Pro- and mesotarsus in males more robust than metatarsus, thus protarsomere 2 twice as wide as long, protarsomere 3 extremely large and ungular protarsomere of equal length as previous one. Claws connate only in extremely short basal part, apparently free.

Abdominal ventrite 1 longer than ventrite 2, ventrite 2 longer than ventrite 3 and 4 combined. Suture 1 sinuous and fine, other sutures straight and deep. Ventrites rarely covered by raised, piliform, whitish setae; surface shiny, only last ventrite mat, with microsculpture.

Sexual dimorphism. Males are known in only two species (*G. rufithorax* and *G. podlussanyi* sp. n.). They are different from females by the differently shaped apex of protibia, all tarsi, antenna, procoxa and metacoxa as well as by the different shape of body. Males in *G. rufithorax* are distinctly smaller than females.

Male genitalia well sclerotised. Aedeagus short and wide (Figs 17, 22), tegmen with short manubrium and parameroides, without armatures. Temones short.

Female genitalia. Sternum 8 with apodeme of medium length. Plate wide to very wide, with distinct margo basalis and indistinct, in several species concave margo apicalis with short setae (Figs 5, 9, 18). Spermatheca C-shaped, with differentiated nodulus and ramus of about equal size and with long cornu (Figs 6, 10, 19).

Type species. *Gyratogaster comosa* K. Daniel et J. Daniel, 1903, by monotypy.

Gyratogaster larinoides (Reitter, 1896)
(Figs 3-6)

Arammichnus larinoides Reitter, 1896: 237.

Type material. Reitter described this species as follows: "Ein einzelnes Exemplar fand Fräulein Antonie Kubitschek im Araxesthal bei Ordubad". I have found one well-preserved female in Reitter's collection (HNHM), measuring 4.09 mm (r. e.) and labelled: Caucasus, Araxesthal, Leder, Reitter [printed] / Monotypus 1896, Arammichnus larinoides Reitter [red margins, handwritten, not original label] / coll. Reitter [printed] / HOLOTYPUS, Arammichnus larinoides Reitter, R. Borovec desig. 2002 [red, handwritten] / Gyratogaster larinoides (Rtt.), R. Borovec det. 2002 [printed].

This species belongs clearly to *Gyratogaster* and is a valid species of that genus.

Additional material examined. 3 ♀♀, Turkey bor., 17.vi.1999, Otlukbeli Daglari mts., Yeniyol pr. [near] Erzincan env. [environs], 2300-2600 m, alp [alpine meadow], S. Benedikt lgt. (SBE, RBO); 1 ♀, Turkey, prov. Erzincan, Derekorosu, Mt. Keshisk, 7.vi.1989, A. Podlussány lgt. (APO); 1 ♀, Turkey, Teine, vil. Gümüshane, 20.v.1987, I. Rozner lgt. (APO); 1 ♀, Turkey, Mar Nero, passo di Kopdagi, tra [between] Erzurum e [and] Trabzon, 4.vi.1964, A. Perissinotto et L. S. Rigatti lgt. (GOS); 1 ♀, Turkey, vil. Erzurum, Horasan, 3.vi.1991, G. E. Dellacasa lgt. (GOS), 1 ♀, Turkey, vil. Gümüshane, Bayburt, 1.vii.1975, 1200 m, G. Osella lgt. (GOS).

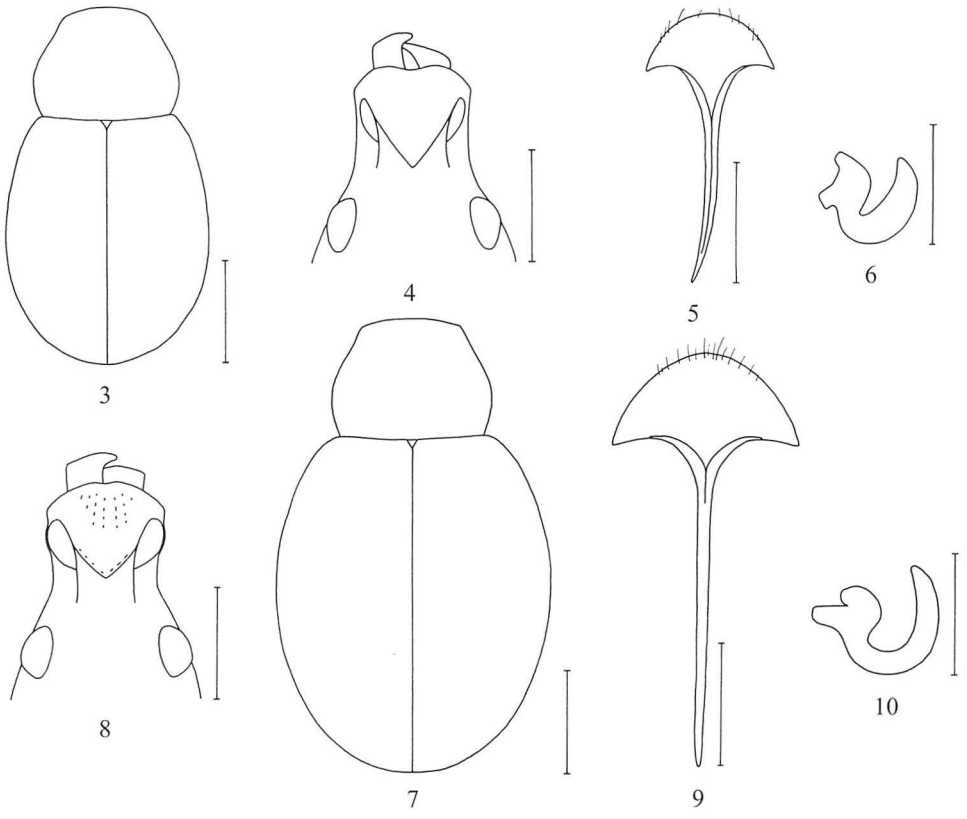
Redescription. Body length (r. e.): 3.69-4.09 mm.

Elytra blackish, pronotum and head dark brownish to blackish, entire legs and antennae rusty reddish. Elytra with one regular row of raised, piliform, whitish setae on each interval, setae gently longer than width of one interval; rarely covered by additional adherent setae of

the same colour and shape, about half as long as raised setae, not covering surface. Pronotum and head with the same vestiture, irregularly scattered.

Rostrum 1.21-1.24 times as wide as long, widest at base, tapering anteriad, with concave sides. Epifrons sparsely punctate, mat; frons shiny, V-shaped, reaching about half the distance between antennal insertion and anterior margin of eyes. Rostrum in lateral view feebly vaulted, gently separated dorsally from rest of head by transversal depression. Eyes hardly protruding from outline of head (Fig. 4).

Scape gently exceeding anterior margin of pronotum. Antennomere 1 slightly longer and wider than antennomere 2; antennomeres 3-5 as long as wide; antennomeres 6 and 7 visibly wider than long.



Figs 3-10. 3-6: *Gyratogaster larinoides* (Reitter): 3 – pronotum and elytra, dorsal view. Scale = 1.00 mm; 4 – head and rostrum, dorsal view. Scale = 0.50 mm; 5 – sternum 8 in female; 6 – spermatheca. Scale = 0.25 mm. 7-10: *G. comosa* K. Daniel et J. Daniel: 7 – pronotum and elytra, dorsal view. Scale = 1.00 mm; 8 – head and rostrum, dorsal view. Scale = 0.50 mm; 9 – sternum 8 in female; 10 – spermatheca. Scale = 0.25 mm.
Obr. 3-10. 3-6: *Gyratogaster larinoides* (Reitter): 3 – štít a krovky, pohled svrchu. Měřítko = 1 mm; 4 – hlava s noscem, pohled svrchu. Měřítko = 0,50 mm; 5 – 8. sternit samice; 6 – spermatéka. Měřítko = 0,25 mm. 7--10: *G. comosa* K. Daniel et J. Daniel: 7 – štít a krovky, pohled svrchu. Měřítko = 1,00 mm; 8 – hlava s noscem, pohled svrchu. Měřítko = 0,50 mm; 9 – 8. sternit samice; 10 – spermatéka. Měřítko = 0,25 mm.

Pronotum 1.24-1.34 times as wide as long, widest behind middle (Fig. 3). Dorsal surface with indistinct, very fine and very sparse, small punctures. Disc shiny, lateral parts of pronotum mat.

Elytra egg-shaped, 1.15-1.24 times as long as wide (Fig. 3).

Tarsomere 2 1.4 times as wide as long, ungular tarsomere 1.4 times as long as tarsomere 3.

Male unknown.

Female genitalia. Plate of sternum 8 only feebly wider than long, umbrella-shaped, translucent except of margo basalis (Fig. 5). Spermatheca with nodulus and ramus of about equal size (Fig. 6).

Differential diagnosis. *G. larinoides* is very easily distinguishable from all remaining species of the genus by having the pronotum almost without punctures. It resembles *G. rufithorax* by its shape and colour of the body and by the similar raised elytral setae, but except of the pronotum it is easily separated also by the presence of adherent setae on the elytra.

Gyratogaster comosa K. Daniel et J. Daniel, 1903, **stat. rest.**
(Figs 7-10)

Gyratogaster comosa K. Daniel et J. Daniel, 1903: 319.
Gyratogaster larinoides: Pesarini, 1971: 145; Pesarini, 1975: 46.

Type material. Original description was based on an unspecified number of specimens from: "Eski-Schehir (Dorylaion) [Turkey] unter Steinen auf trockenem Boden mehrfach aufgefunden". I have examined six females deposited in four different collections from that locality: 3 ♀♀ (MNHU), labelled: Klein-Asien, Eski-Chehir, v. Bodemeyer [printed] / Gyratogaster comosus, Dan nov. gen. nov. spec. Type [handwritten]; 1 ♀ from Formánek's collection (NMP), labelled: Klein-Asien, Eski-Chehir, v. Bodemeyer [printed] / larinoides, det. Formánek [Formánek's handwriting] / comosus, Dan. typ [handwritten]; 1 ♀ (DEI), labelled: Klein-Asien, Eski-Chehir, v. Bodemeyer [printed] / Gyratogaster comosus Dan. [handwritten, red ink] / Coll. O. Leonhard [printed] / Syntypus [red, printed, not original label] / Gyratogaster larinoides Reitter [handwritten] / Coll. DEI Eberswalde [printed]; 1 ♀ (SMT), labelled: Asia minor, Eski-Chehir [printed] / Asia minor, Bos-Daglt, v. Bodemeyer [printed] / cotyp [handwritten] / Gyratogaster comosus D. [handwritten] / Samml. K. F. Hartmannn, Ankauf 1941 [printed] / Staatl. Museum für Tierkunde, Dresden [printed]. I do not consider these specimens syntypes because Daniel & Daniel (1903) did not mention any other type depository apart from their own collection in the original description. However, I consider these specimens as "topotypes" that moreover fit the description very closely.

Although *G. comosa* was in all previous literature considered as a junior synonym of *G. larinoides*, the specimens at my disposal are completely different from *G. larinoides* and I have no doubt that they constitute a valid species.

Additional material examined. 1 ♀, Turkey, Anatolia centr., Nevsehir – Gore, 21.iv.1992, 1200 m, R. Borovec lgt. (RBO); 1 ♀, [Turkey] Tokat (NMP).

Redescription. Body length (r. e.): 3.69-4.56 mm.

Body blackish, legs and antennae dark brownish, femora darker. Elytra with 1) long, piliform, brownish, raised setae longer than width of one interval and creating one or two irregular rows on each interval and 2) very dense, adherent, irregularly spotted, brownish and greyish piliform setae completely covering surface and shorter than raised ones.

Pronotum and head with similar vestiture, raised setae shorter than elytral ones.

Rostrum as long as wide, widest at base, with concave sides. Epifrons shiny, punctate, covered by dense adherent setae. Frons bare and shiny, with only several small punctures, V-shaped, feebly exceeding posterior border of pit-shaped scrobes. Rostrum vaulted, gently separated dorsally from rest of head by transversal depression. Eyes feebly protruding from outline of head (Fig. 8).

Scape reaching anterior pronotal margin. Antennomere 1 only gently longer and wider than antennomere 2; antennomeres 3-5 as long as wide; antennomeres 6 and 7 wider than long.

Pronotum 1.32-1.39 times as wide as long, widest behind middle (Fig. 7), densely and regularly punctate, distance between punctures smaller than their diameter.

Elytra oval, 1.16-1.21 times as long as wide, striae punctate, intervals flat and wide (Fig. 7).

Tarsomere 2 1.5 times as wide as long, ungular tarsomere 1.3 times as long as tarsomere 3.

Male unknown.

Female genitalia. Plate of sternum 8 only feebly wider than long, umbrella-shaped, translucent except of margo basalis (Fig. 9). Spermatheca with ramus longer and larger than nodulus (Fig. 10).

Differential diagnosis. *G. comosa* is very easily distinguishable from all other species of the genus by its very dense elytral vestiture completely covering the surface and the very dense pronotal punctures.

Gyratogaster discretus Voss, 1943

Gyratogaster discretus Voss, 1943: 212.
Gyratogaster discretus: Pesarini, 1975: 45.

Type material. Voss (1943) described this species from an unspecified number of specimens from: "Kleinasien [Turkey]: Odemisch [Ödemiş] (IV. 1914, Kulzer leg.); Syrien [Lebanon]: Beirut. – Mus. Frey. (Coll. Stöcklein), Coll. auct.". Only a label of this species is preserved in Museum Frey (now part of NMB) but all specimens are missing (E. Sprecher, pers. comm.). Because no other specimens of this species are known, I repeat the original description. Following the generic name used by Voss (1943) and accepted also by Pesarini (1974), I include this species in the genus *Gyratogaster*. However, its true generic position has to be confirmed by the study of type material. For the purpose of the species key I follow Pesarini (1974) and use the very clear character of dentate femora, which should easily separate this species all other species of the genus.

Original description. "Kopf stark quer, fein und sehr dicht, leicht verrunzelt punktiert. Stirn fast doppelt so breit wie die Augen lang, mit tiefer, schmaler Längsfurche; Augen flach gewölbt. Rüssel fast so lang wie breit, von der Basis zur Mitte leicht gerundet verschmälert. Pterygien schwach verbreitert. Dorsal mit flacher, muldenförmiger Längsvertiefung beim ♀. Fühlerschaft schlank, zur Spitze gekeult. 1. Geisselglied fast dreimal so lang wie breit, gekeult; 2. Glied länger als breit, nicht halb so lang wie das 1. Glied; 3. und 4. Glied so lang wie breit; die übrigen breiter als lang. Keule länglich oval, doppelt so lang wie breit. – Halsschild fast doppelt so breit wie lang, seitlich stark gerundet, vorn wenig ausgezogen; seitlich leicht gewulstet. Punktierung fein wie diejenige des Kopfes und sehr dicht; Scheibe mit sehr feinem Mittelkiel, beiderseits desselben in der Mitte mit leicht polierter, kreisrunder Fläche, in der die Punkte

etwas weniger dicht stehen; Basis und Vorderrand gerade abgestutzt. – Flügeldecken eiförmig, 1 und 1/3 mal so lang wie breit, an der Basis in kleinerem Bogen gerundet als zur Spitze. Punktstreifen fein, leicht vertieft, die Punkte schmal getrennt; Zwischenräume viel breiter als die Streifen, flach, oder die seitlichen leicht gewölbt. Punktierung der Streifen sehr fein und sehr dicht, die Oberfläche dadurch mattiert. – Schenkel ziemlich kräftig gezähnt. Vordertibien innen flach doppelbuchtig, an der Spitze wie in dem Subgenus Arammichnus nach aussen und innen erweitert. – Färbung schwarz; Fühler, mit ausnahme des Schaftspitze, und das Krallenglied dunkelrot. – Behaarung dicht anliegend greis, dorsal mit hellbraunen Flecken unregelmässig untermischt. Nur hinten sind auf den Flügeldecken sehr kurze, aufstehende Härchen festzustellen. – L.: 6-6,8 mm. – Von *Gyratogaster larinoides* Reitt. ist diese Art schon durch die nicht aufstehende längere Behaarung zu unterscheiden; lediglich in der Seitenansicht sind auf dem Deckenabsturz sehr kurze, abstehende Härchen bemerkbar."

Gyratogaster rufithorax Pesarini, 1975
(Figs 11-19)

Gyratogaster rufithorax Pesarini, 1974: 45.

Type material. Pesarini (1975) stated in his original description: "Holotypus ♂ e Allotypus ♀: D. Bakir-Lice (Turchia), 11.5.72, conservati presso l'Instituto d'Entomologia dell'Università di Smirne. Paratypus ♂: Medesima provenienza e data, nella mia collezione". I have examined one well preserved female from the collection of Carlo Pesarini, measuring 3.82 mm (r. e.) and labelled as follows: Bakir – Lice, 11-5-72 [handwritten] / Gyratogaster rufithorax m., Holotypus ♂, C. Pesarini [red, handwritten] / HOLOTYPUS Gyratogaster rufithorax m. C. Pesarini [red, partly handwritten, partly printed] / Gyratogaster rufithorax Pesarini ♀, R. Borovec det. 2002 [printed].

Since males are extremely slender with small and short elytra and robust pronotum, it is clear from the original description that the type series contained only females. Males of this species are described in this paper as the first known males of the genus.

Additional material examined. 6 ♂♂, 5 ♀♀, Turkey, Agri: Tutak, 12.iv.1990, A. Podlussány lgt. (APO, RBO).

Redescription. Body length (r. e.): ♂♂ 3.44-3.75 mm, ♀♀ 3.82-4.38 mm.

Elytra blackish, pronotum and head rusty brownish to dark brownish, legs and antennae rusty brownish. Elytra with 1) regular row of long and raised, piliform, whitish setae on each interval, longer than width of one interval and 2) with only several isolated semierect setae, strikingly shorter than raised ones. Pronotum and head with the same setae as those on elytra, on pronotum transversely directed towards midline.

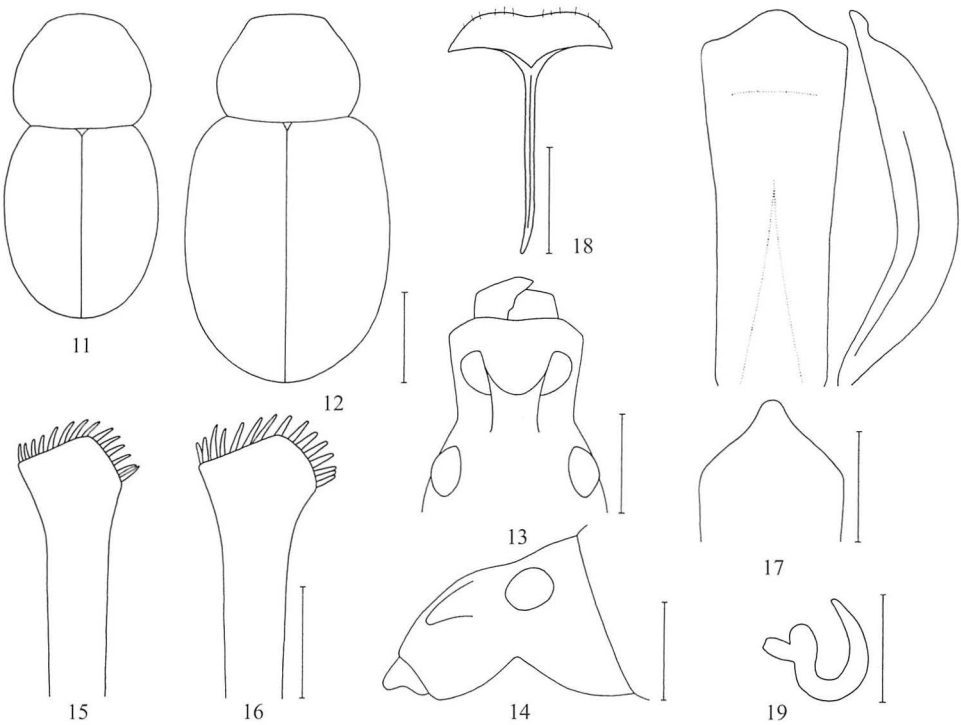
Rostrum in females 1.08-1.13 times as wide as long, widest at base, in short basal part tapered anteriad and then feebly enlarged again, with concave sides (Fig. 13). Rostrum in males narrower, 1.03 times as long as wide, apex as wide as base, similar to rostrum of male of *G. podlussanyi* sp. n. (as in Fig. 21). Epifrons very narrow, punctate and mat. Frons very shiny, U-shaped, reaching posterior border of pit-shaped scrobes. Rostrum vaulted, visibly separated dorsally from rest of head by transversal depression. Eyes hardly protruding from outline of head (Fig. 13).

Scape reaching anterior margin of pronotum, apex in females narrower than club, in males about as wide as club. Antennomere 1 in both sexes only gently longer and wider than

antennomere 2. Antennomeres 3-5 in females as wide as long, antennomeres 6 and 7 wider than long; antennomere 3 in males as wide as long, antennomeres 4 and 5 wider than long, antennomeres 6 and 7 strikingly wider than long.

Pronotum very shiny, evenly but sparsely punctate, distances between punctures about twice as large as their diameter; longitudinal midline ill-defined and narrow, impunctate. Pronotum in females 1.26-1.29 times as wide as long, widest behind middle, strikingly tapered anteriad, in lateral view feebly vaulted, strikingly narrower than elytra (Fig. 12). Pronotum in males very robust, in lateral view strongly vaulted, 1.20-1.25 times as wide as long, almost as wide as elytra (Fig. 11).

Elytra with finely punctate striae, striae not impressed. Elytra oval, in females 1.24-1.30 times and in males 1.29-1.35 times as long as wide. Elytra in females of usual size, 2.29-2.53



Figs 11-19. *Gyratogaster rufithorax* Pesarini: 11 – pronotum and elytra in male, dorsal view; 12 – pronotum and elytra in female, dorsal view. Scale = 1.00 mm; 13 – head and rostrum in dorsal view; 14 – head and rostrum in lateral view. Scale = 0.50 mm; 15 – apex of protibia in male, dorsal view; 16 – apex of protibia in female, dorsal view; 17 – aedeagus, ventral and lateral view and apex; 18 – sternum 8 in female; 19 – spermatheca. Scale = 0.25 mm.

Obr. 11-19. *Gyratogaster rufithorax* Pesarini: 11 – štít a krovky samce, pohled svrchu; 12 – štít a krovky samice, pohled svrchu. Měřítko = 1,00 mm; 13 – hlava s noscem, pohled svrchu; 14 – hlava s noscem, boční pohled. Měřítko = 0,50 mm; 15 – špice pravé přední holeně samce, pohled svrchu; 16 – špice pravé přední holeně samice, pohled svrchu; 17 – aedeagus, spodní a boční pohled, špice; 18 – 8. sternit samice; 19 – spermatéka. Měřítko = 0,25 mm.

times as long as pronotum (Fig. 12), in males extremely small, only 1.71-1.84 times as long as pronotum (Fig. 11).

Metatarsus more slender than protarsus in females, protarsomere 2 1.6 times as wide as long, ungular protarsomere 1.5 times as long as previous one; metatarsomere 2 1.1 times as wide as long, ungular metatarsomere 1.8 times as long as previous one. Protarsus in males very robust, protarsomere 2 1.9 times as wide as long, ungular protarsomere as long as previous one; metatarsus more slender, metatarsomere 2 1.4 times as wide as long, ungular metatarsomere 1.4 times as long as previous one.

Male genitalia. Aedeagus in ventral view regularly enlarged distad, apex dully pointed with emarginate sides; in lateral view regularly curved, constricted before narrow and pointed apex (Fig. 17).

Female genitalia. Plate of sternum 8 very short and wide, translucent except of sclerotised margo basalis, with concave margo anterior (Fig. 18). Spermatheca with slender ramus and wide nodulus (Fig. 19).

Differential diagnosis. The shape of body and rostrum and the elytral colour in *G. rufithorax* is similar to *G. larinoides*; see the diagnosis of the latter for characters separating both species. Males of *G. rufithorax* are similar to *G. podlussanyi* sp. n.; their distinguishing characters are stated in the species key.

Gyratogaster podlussanyi sp. n.

(Figs 1, 20-22)

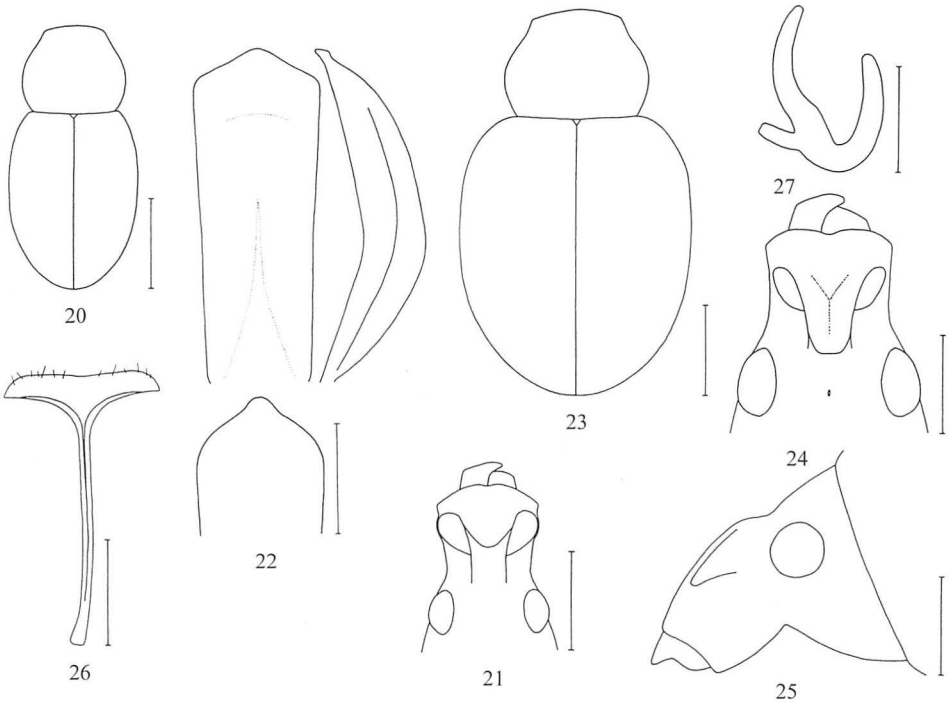
Type material. Holotype: ♂, Turkey, Van: Yenikosk, 11.iv.1990, leg. A. Podlussány (APO).

Description. Body length (r. e.): 3.25 mm.

Body and femora black; tibiae, tarsi and antennae reddish. Elytra with 1) one dense, regular row of very long, whitish, raised piliform setae on each interval, and 2) several shorter raised setae of the same colour beneath them. Long raised setae creating rows near elytral apices strikingly longer than width of one interval. Pronotum and head with shorter, semierect setae of the same colour, apices of setae on pronotum directed transversely to midline. Tibiae with long and raised, piliform whitish setae, remaining parts of legs and antennae with short and semierect whitish setae (Fig. 1).

Rostrum 1.07 times as long as wide, apex as wide as base, with concave sides. Scrobes in dorsal view completely visible, opened; in lateral view short, feebly enlarged, ventral margin directed below ventral margin of eye. Epifrons shiny, very narrow, at midlength of rostrum narrower than half of its width. Frons very shiny with indistinct posterior margin, curved ventrally, slightly angular in lateral view, feebly vaulted, almost reaching posterior border of pit-shaped scrobes. Epistome not differentiated. Rostrum vaulted, indistinctly separated dorsally from rest of head by very shallow transversal depression. Eyes moderately sized, convex, feebly protruding from outline of head (Fig. 21).

Scape short, reaching anterior margin of pronotum, straight and slender, strongly thickened at apex. Antennomere 1 1.6 times as long as wide, conical. Antennomere 2 1.7 times as long as wide, thickened only at apex, slightly shorter and narrower than previous one. Antennomeres 3-7 with strongly rounded sides, antennomere 3 as wide as long, antennomeres 4 and 5 gently wider than long, antennomeres 6 and 7 1.5 times as wide as long. Club about twice as long as wide, gently shorter than four preceding antennomeres combined (Fig. 1).



Figs 20-27. 20-22: *Gyratogaster podlussanyi* sp. n.: 20 – pronotum and elytra, dorsal view. Scale = 1.00 mm; 21 – head and rostrum, dorsal view. Scale = 0.50 mm; 22 – aedeagus, ventral and lateral view and apex. Scale = 0.25 mm. 23-27: *Leianisorhynchus brunnescens* Pic: 23 – pronotum and elytra, dorsal view. Scale = 1.00 mm; 24 – head and rostrum, dorsal view; 25 – head and rostrum, lateral view. Scale = 0.50 mm; 26 – sternum 8 in female; 27 – spermatheca. Scale = 0.25 mm.
Obr. 20-27. 20-22: *Gyratogaster podlussanyi* sp. n.: 20 – štít a krovky, pohled svrchu. Měřítko = 1,00 mm; 21 – hlava s noscem, pohled svrchu. Měřítko = 0,50 mm; 22 – aedeagus, spodní a boční pohled, špice. Měřítko = 0,25 mm. 23-27: *Leianisorhynchus brunnescens* Pic: 23 – štít a krovky, pohled svrchu. Měřítko = 1,00 mm; 24 – hlava s noscem, pohled svrchu; 25 – hlava s noscem, boční pohled. Měřítko = 0,50 mm; 26 – 8. sternit samice; 27 – spermatéka. Měřítko = 0,25 mm.

Pronotum 1.20 times as wide as long, widest behind middle, with strongly rounded sides, only gently narrower than elytra. Anterior border narrower than posterior one (Fig. 20). Dorsal surface strongly shiny, finely and very sparsely punctate, distance between punctures several times larger than their diameter, punctures in middle of disc smaller and shallower than those along pronotal margins (Fig. 1). Pronotum in lateral view feebly vaulted.

Scutellum small, triangular, indistinct (Fig. 1).

Elytra slender, long-oval, 1.39 times as long as wide, 2.00 times as long as pronotum (Fig. 20), with fine sculpture, less shiny than pronotum. Striae indistinctly punctate, intervals flat and wide (Fig. 1).

Femora inermis. Tibiae long and slender. Protibia strikingly enlarged at inner side of apex, at outer side almost straight, only gently and indistinctly enlarged. Apex rounded, with a fringe

of fine and short yellowish setae. Pro- and mesotarsus more robust than metatarsus. Protarsomere 2 2.1 times as wide as long, ungular protarsomere as long as previous one. Metatarsomere 2 1.3 times as wide as long, ungular metatarsomere 1.2 times as long as previous one. Claws free (Fig. 1).

Male genitalia. Aedeagus short and wide, in ventral view regularly enlarged towards apex, apex obtusely subtriangular, indistinctly pointed; in lateral view regularly curved, with very small and dull point at apex (Fig. 22).

Collection circumstances. Unknown.

Etymology. Named in honour of Attila Podlussány (Budapest), a leading specialist in Curculionidae.

Differential diagnosis. This new species is similar to *G. rufithorax* by its punctured dorsal surface of the pronotum and the lack of adherent setae on the pronotum and elytra; characters distinguishing these two species are stated in the key.

Key to species of *Gyratogaster*

1. Femora dentate. Body length 6.0-6.8 mm. ..... *G. discretus* Voss
– Femora inermis. 2
2. Dorsal surface of pronotum shiny, without punctures. Body length 3.7-4.1 mm. ..... *G. larinoides* (Reitter)
– Dorsal surface of pronotum sparsely or densely punctate. 3
3. Pronotum and elytra with very dense adherent setae and dense raised setae. Pronotum very densely punctate, mat, distance between two punctures strikingly smaller than their diameter. Body length 3.7-4.6 mm. ..... *G. comosa* K. Daniel et J. Daniel
– Pronotum and elytra almost glabrous with long raised setae and beneath them with only several short, very sparse raised or semierect setae (Fig. 1). Pronotum very sparsely punctate, shiny, distance between two punctures strikingly larger than their diameter. 4
4. Femora reddish brown. Elytral striae with distinct punctures. Rostrum strongly vaulted, epifrons separated from head by visible transversal depression. Pronotum in males robust, almost as wide as elytra, elytra 1.71-1.84 times as long as pronotum (Fig. 11). Apex of aedeagus in ventral and lateral view more elongate (Fig. 17). Body length 3.7-4.4 mm. ..... *G. rufithorax* Pesarini
– Femora blackish. Elytral striae without visible punctures. Rostrum feebly vaulted, epifrons indistinctly separated from head. Pronotum in males less robust, narrower than elytra, elytra 2.00 times as long as pronotum (Fig. 20). Apex of aedeagus in ventral and lateral view shorter (Fig. 22). Body length 3.3 mm... ..... *G. podlussanyi* sp. n.

Leianisorhynchus Pic, 1905

Leianisorhynchus Pic, 1905: 178.
Leianisorhynchus: Alonso-Zarazaga & Lyal, 1999: 166.

Redescription. Body length (r. e.): 3.9-6.8 mm.

Body brownish to blackish, antennae and legs brownish to dark brownish. All setae piliform and semierect, in *G. wittmeri* combined with adherent setae. Tibiae with long and erect setae.

Rostrum wider than long or about as wide as long, with concave sides. Epifrons narrow. Frons shiny, extremely large, strongly elevated from rostrum, reaching almost anterior margin of eyes. Epistome not differentiated. Scrobes in dorsal view completely visible and opened, in lateral view short and strongly enlarged, ventral margin directed below ventral margin of eye. Rostrum in lateral view strongly vaulted, separated dorsally from rest of head by conspicuously deep transversal depression. Eyes small, dorsally placed, feebly protruding from outline of head (Figs 24, 25, 29).

Antenna slender. Scape gently surpassing anterior margin of pronotum, slightly curved, strongly thickened in short apical part. Funicle slender, antennomeres 1 and 2 longer than wide.

Pronotum wide, widest at or behind midlength (Figs 23, 28), strongly and regularly vaulted, without any sculpture, sparsely or densely punctate.

Procoxa semiglobular, closer to anterior than to posterior margin of pronotum. Coxal cavities contiguous.

Scutellum small and triangular, badly visible.

Elytra oval or oblong-oval, with punctate striae and flat and wide intervals. Base feebly arched (Figs 23, 28).

Mesocoxa semiglobular, mesosternal process narrow. Metacoxa transversal; metasternal process narrower than transverse diameter of metacoxa, straight.

All femora inermis. Apex of protibia strongly enlarged outside, rounded, with a fringe of short yellowish setae (as in Fig. 16). Mesotibia with short spine inside. Metatibial corbels opened, with sharp and complete longitudinal ridge, dividing corbels into two parts. Tarsi long and slender; tarsomere 3 deeply bilobed, strikingly wider than previous one. Ungular tarsomere longer than tarsomere 3. Claws free.

Ventrite 1 slightly longer than ventrite 2, ventrite 2 longer than ventrites 3 and 4 combined. Suture 1 sinuous and fine, other sutures straight and deep. Ventrites shiny with microsculpture, sparsely covered by semierect, piliform, whitish setae.

Males unknown.

Female genitalia. Sternum 8 with apodeme of medium length. Plate transversal, very wide and short, with distinct margo basalis and with indistinct, feebly concave margo apicalis with short setae (Figs 26, 30). Spermatheca with very long and conspicuous nodulus that is about as long as cornu. Ramus short and small (Figs 27, 31).

Type species. *Leianisorhynchus brunnesces* Pic, 1905, by monotypy.

Leianisorhynchus brunnescens Pic, 1905
(Figs 23-27)

Leianisorhynchus brunnescens Pic, 1905: 179.

Type material. Pic (1905) described the genus and species based on one specimen from Adana, without specifying its sex. This type specimen could not be found in Pic's collection and was not available for the study.

Additional material examined. I studied two females from Syria (Aleppo [Halab], Tal-Hadia, Lentil, 26.iii.1980, coll. JFR) that fit the description very closely and come from a locality near to Adana. I assume that they represent *L. brunnescens*.

Redescription. Body length (r. e.): 3.94-4.56 mm.

Entire body including legs and antennae unicoloured, light or dark brownish. Elytra with semierect, short, piliform whitish setae creating 4-6 irregular rows on each interval, gently longer than half of width of each interval. Pronotum and head with the same vestiture, setae on pronotum transverse to midline.

Rostrum 1.20-1.24 times as wide as long, widest at base, feebly tapering anteriad, with concave sides. Frons shiny, U-shaped with indistinct Y-shaped depression, extremely large,

reaching anterior margin of eyes, strongly elevated from rostrum. Rostrum vaulted, visibly separated dorsally from rest of head by deep transversal depression. Eyes feebly protruding from outline of head (Fig. 24).

Scape surpassing anterior margin of pronotum. Antennomere 1 visibly longer and slightly wider than antennomere 2. Antennomeres 3-5 about as long as wide, antennomeres 6 and 7 wider than long.

Pronotum 1.35-1.39 times as wide as long, widest behind middle, with strongly rounded sides (Fig. 23). Dorsal surface strongly shiny, sparsely punctate, distance between two punctures about 2-3 times as large as their diameter, with ill-defined, longitudinal, impunctate midline.

Elytra oval, 1.16-1.21 times as wide as long (Fig. 23), striae punctured, intervals flat and wide.

Tarsomere 2 1.1 times as wide as long, ungular tarsomere 1.8 times as long as tarsomere 3.

Male unknown.

Female genitalia. Sternum 8 with very wide and short plate, feebly concave at apex, translucent except of margo basalis (Fig. 26). Spermatheca with extremely long and regularly curved nodulus that is longer than ramus and about as long as cornu (Fig. 27).

Differential diagnosis. Easily distinguished from *L. wittmeri* by characters stated in the key.

Leianisorhynchus wittmeri (Pesarini, 1971), **comb. n.**
(Figs 28-31)

Gyratogaster wittmeri Pesarini, 1971: 144.
Gyratogaster wittmeri: Pesarini, 1975: 45.

Type material. The type series consists of two females from Tekir in Turkey, collected by Wittmer and Besuchet and housed in NMB and in the collection of G. Osella. I have examined both specimens. The female from NMB, measuring 6.31 mm (r. e.), lacks right antenna and three terminal tarsomeres of right mesothoracic and left metathoracic legs. It bears the following labels: Tekir, 21.5.1969 [printed] / Türkei, W. Wittmer [printed] / Gyratogaster wittmeri m., Holotypus ♀, det. Pesarini [red, handwritten] / Leianisorhynchus wittmeri (Pesarini), R. Borovec det. 2002 [printed]. The female from GOS bears the following labels: Turchia, Tekir, 4.v.1969, 1200 m, Besuchet [handwritten] / Gyratogaster wittmeri m., Paratypus ♀, det. Pesarini [red, handwritten] / Leianisorhynchus wittmeri (Pesarini), R. Borovec det. 2002 [printed].

It is undoubtedly a valid species belonging to the genus *Leianisorhynchus* and closely related to *L. brunnescens*.

Additional material examined. 1 ♀, Turkey, Toros da□lari, Içel vil., Çamliysyla, 15.v.1984, kopoglatva, D. Szalóki lgt. (APO).

Redescription. Body length (r. e.): 6.31-6.81 mm.

Body unicoloured, rusty brownish. Elytral intervals with 1) semierect, piliform brownish setae longer than half of width of interval and 2) shorter and adherent, piliform whitish setae beneath them. Pronotum and head with the same vestiture, setae on pronotum directed transversally towards midline.

Rostrum only 1.04 times as long as wide, widest at base, in basal 0.25 tapering anteriad, in apical 0.75 feebly enlarged anteriad, with concave sides. Frons V-shaped, very large, reaching almost anterior margin of eyes, strongly elevated from rostrum, shiny with several very fine

and short longitudinal striae at apex. Rostrum vaulted, visibly separated dorsally from rest of head by deep transversal depression. Eyes feebly protruding from outline of head (Fig. 29).

Scape gently surpassing anterior margin of pronotum. Antennomere 1 shorter or as long as tarsomere 2, antennomeres 3 and 4 longer than wide, antennomeres 5 and 6 as long as wide, antennomere 7 wider than long.

Pronotum 1.28-1.29 times as wide as long, widest behind middle, with strongly rounded sides (Fig. 28). Dorsal surface shiny, evenly and densely punctate, punctures separated by less than their diameter.

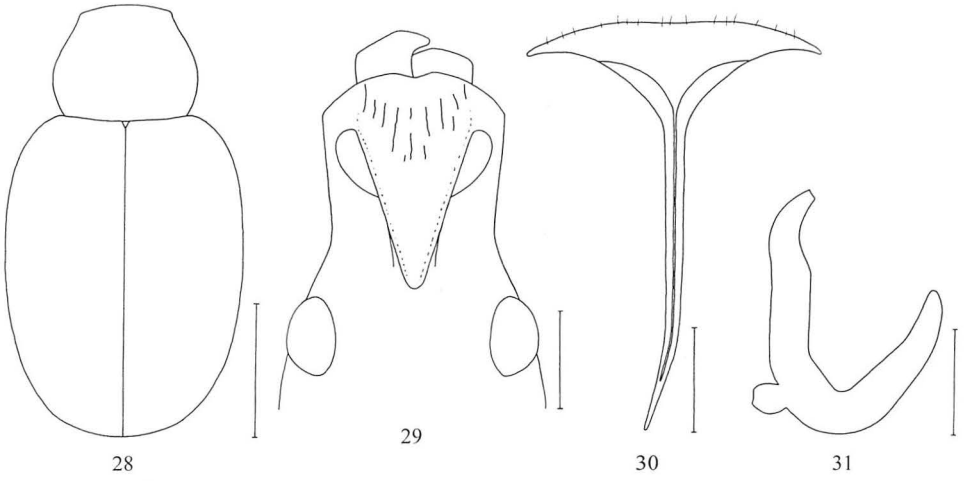
Elytra oblong-oval, 1.22-1.32 times as long as wide (Fig. 28), striae punctate, intervals flat and wide.

Tarsomere 2 about as long as wide, ungular tarsomere 1.3 times as long as tarsomere 3.

Male unknown.

Female genitalia. Sternum 8 with very wide and short plate, feebly concave at apex, translucent except of margo basalis (Fig. 30). Spermatheca with extremely long nodulus that is straight, only apically curved, longer than ramus and about as long as cornu (Fig. 31).

Differential diagnosis. Easily distinguished from *L. brunnescens* by characters stated in the key.



Figs 28-31. *Leianisorhynchus wittmeri* (Pesarini): 28 – pronotum and elytra, dorsal view. Scale = 1.00 mm; 29 – head and rostrum, dorsal view. Scale = 0.50 mm; 30 – sternum 8 in female; 31 – spermatheca. Scale = 0.25 mm.

Obr. 28-31. *Leianisorhynchus wittmeri* (Pesarini): 28 – štít a krovky, pohled svrchu. Měřítko = 1,00 mm; 29 – hlava s noscem, pohled svrchu. Měřítko = 0,50 mm; 30 – 8. sternit samice; 31 – spermatéka. Měřítko = 0,25 mm.

Key to the species of *Leianisorhynchus*

1. Rostrum wider than long (Fig. 24). Pronotum sparsely punctured, distance of punctures strikingly larger than their diameter. Antenna shorter and stouter; antennomere 2 shorter than antennomere 1, antennomere 3 as long as wide. Elytral intervals with semierect whitish setae. Nodulus curved in the whole length, ramus longer than wide (Fig. 27). Smaller species, body length 3.9-4.6 mm. ..... *L. brunnescens* Pic

– Rostrum about as long as wide (Fig. 29). Pronotum densely punctate, distance of punctures smaller than their diameter. Antenna longer and more slender; antennomere 2 as long or gently longer than antennomere 1, antennomere 3 longer than wide. Elytral intervals with longer, semierect brownish setae and shorter, adherent whitish setae beneath them. Nodulus straight, only at apex curved, ramus as long as wide (Fig. 31). Larger species, body length 6.3-6.8 mm. ..... *L. wittmeri* (Pesarini)

Note. I have seen one female specimen of *Leianisorhynchus*: 1 ♀, Turkey s.e., Gülek, 21.v.1995, T. Rybárik lgt., coll. JFR, that probably represents a new species. I did not describe it here since it lacks pronotal and elytral vestiture. The specimen is 5.13 mm long, black in colour, similar to *L. brunnescens* but distinguished from it by a more slender elytra, sparser punctures on pronotum, probably different elytral and pronotal setae (based only on observation of several remaining setae in lateral parts of pronotum and at the apex and shoulders of elytra) and by a gently different shape of nodulus.

Altonomus Desbrochers, 1907

Altonomus Desbrochers, 1907: 95.
Mylacorrhina Reitter, 1913: 13.
Altonomus: Alonso-Zarazaga & Lyal, 1999: 154.

Redescription. Body length (r. e.): 2.4-3.4 mm.

Body light or dark brownish; tarsi, tibiae and antennae sometimes lighter. All setae piliform, on elytra semierect or erect, short and dense, in some species combined with adherent setae. Tibiae with short and semierect or long and erect setae.

Rostrum wider than long or only gently longer than wide, widest at base, with concave sides. Epifrons narrow. Frons small or large, reaching or gently exceeding posterior border of pit-shaped scrobes, mat and depressed or shiny and feebly concave, curved ventrally, slightly angular in lateral view. Epistome not differentiated. Scrobes in dorsal view completely visible, opened; in lateral view short, strongly widening posteriad, ventral margin directed towards or below ventral margin of eye. Rostrum in lateral view vaulted, in the same plane as head. Eyes small, dorsally placed, convex, more or less protruding from outline of head (Figs 33, 36, 37, 42, 49, 53).

Antenna slender. Scape long, surpassing anterior margin of pronotum, curved, in apical half thickened towards apex. Funicle slender with antennomeres 1 and 2 longer than wide. Scape and all antennomeres more robust in males than in females.

Pronotum wider than long, widest in or behind midlength (Figs 32, 35, 40, 41, 48, 52), vaulted; pronotal surface regularly, finely or coarsely punctured, without any other sculpture.

Procoxa semiglobular, slightly closer to anterior than to posterior margin of prosternum. Coxal cavities contiguous.

Scutellum small, triangular, badly visible.

Elytra oval to globose, in males shorter and wider than in females (Figs 32, 35, 40, 41, 48, 52); striae punctate, intervals flat and wide. Base at most feebly arched.

Mesocoxa semiglobular, mesosternal process narrow. Metacoxa transversal, metasternal process about as wide as transversal diameter of metacoxa, straight.

All femora inermis. Protibia enlarged inside, in females gently enlarged outside, in males rounded at outer side. Apex rounded, with a fringe of short yellowish setae (Figs 43, 44). Meso- and metatibia with one or two spines at inner side. Metatibial corbel opened, with short and indistinct longitudinal ridge dividing the corbel into two parts. Tarsi long and slender;

tarsomere 3 bilobed, strikingly wider than previous one, ungular tarsomere as long as or longer than tarsomere 3. Pro- and mesotarsus more robust than metatarsus in males, with tarsomere 2 twice as wide as long, tarsomere 3 extremely large, and ungular tarsomere shorter than tarsomere 3. Claws free.

Ventrite 1 slightly longer than ventrite 2, ventrite 2 gently longer than ventrites 3 and 4 combined. Suture 1 sinuous and fine, other sutures straight and deep. All ventrites sparsely covered by raised, piliform whitish setae.

Sexual dimorphism. Males are known only in two species, *A. vernalis* and *A. jelineki* sp. n. They differ in the shape of protibia, all tarsi, antenna and elytra as stated above.

Male genitalia. Aedeagus well sclerotised and long (Figs 45, 54); tegmen with short manubrium and parameroides, without armatures; temones short.

Female genitalia. Apodeme of sternum 8 of medium length, apically contiguous or divergent just inside of plate. Plate narrow, in most species longer than wide, without distinct margo basalis and apicalis, with apical setae (Figs 34, 38, 46, 50). Spermatheca C-shaped, with well-separated nodulus and ramus (Figs 39, 47, 51).

Type species. *Altonomus demaisoni* Desbrochers, 1907 = *Mylacus villosus* Reitter, 1906, by monotypy.

Altonomus reitteri (Stierlin, 1884)
(Figs 32-34)

Mylacus reitteri Stierlin, 1884: 91.
Desbrochersella reitteri: Reitter, 1906: 211; González, 1970: 63-65.
Mylacorrhina reitteri: Reitter, 1913: 13.
Mylacus reitteri: Angelov, 1973: 274.

Type material. This species was described from an unspecified number of specimens from "Syrien". Angelov (1973) studied two type specimens from DEI and HNHM, both of them labelled "Syrien [Israel] , Kaifa". L. Behne (pers. comm.) did not find any type specimen in Stierlin's collection in DEI and that is why I studied only one specimen deposited in Reitter's collection in HNHM. Because Stierlin's description was based on at least two specimens, I herein designate the specimen from Reitter's collection as the lectotype. It is a female measuring 2.56 mm (r. e.) and labelled: Syrien, Kaifa, Reitter [printed] / 3. St. [small square, printed] / Holotypus 1884-87, Mylacus reitteri Stierlin [red margins, handwritten, not original label] / Mylacus Reitteri Stl., Typ. prope Senaci [handwritten] / M. reitteri Stierl., coll. Reitter [handwritten] / LECTOTYPUS Mylacus reitteri Stierlin, R. Borovec desig. 2002 [red, handwritten] / Altonomus reitteri (Stierlin), R. Borovec det. 2002 [printed]. Genitalia are dissected and mounted on the same label as specimen.

This is a valid species.

Additional material examined. 1 ♀, Israel, Yavne'el [in Upper Galilee], 2.ii.1973, D. Furth lgt. (TAU).

Redescription. Body length (r. e.): 2.38-2.56 mm.

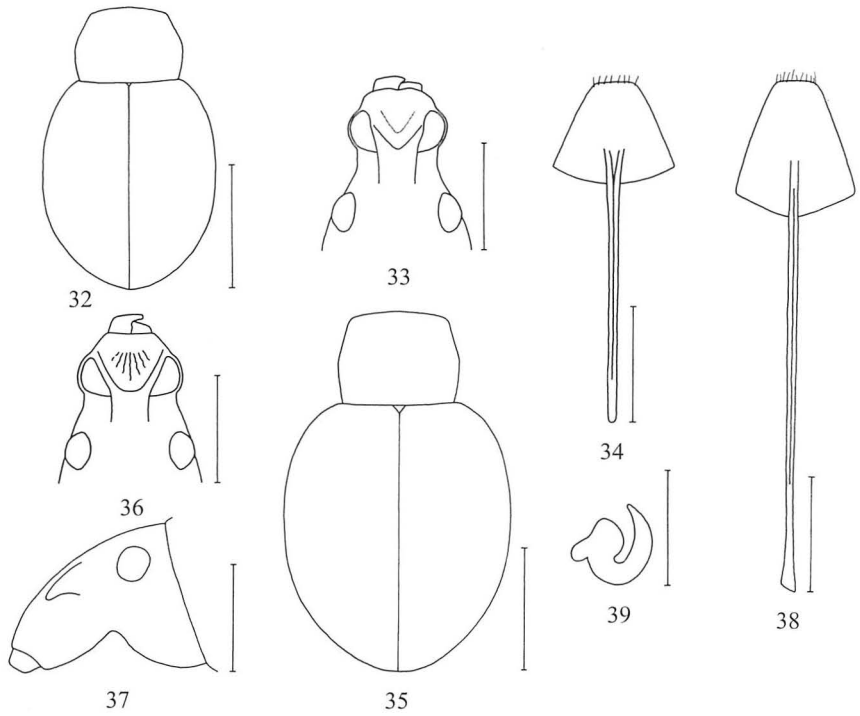
Body including legs and antennae unicoloured dark brownish. Elytra with short adherent piliform setae, only at apex feebly semierect. Setae whitish with feeble bronze lustre, gently longer than half of width of each interval, creating 3-4 irregular rows on each interval and one row on each stria. Pronotum and head with similar setae, directed transversally to midline.

Rostrum 1.04-1.07 times as long as wide, at base only very gently wider than at apex, with strongly concave sides. Epifrons mat and punctured, frons small and feebly shiny, reaching posterior border of pit-shaped scrobes. Eyes small and convex, feebly protruding from outline of head (Fig. 33).

Antennomere 1 visibly longer and gently wider than antennomere 2, both of them twice as long as wide. Antennomeres 3 and 4 gently longer than wide, antennomere 5 as long as wide, antennomeres 6 and 7 gently wider than long.

Pronotum 1.28-1.35 times as wide as long, widest behind middle (Fig. 32). Dorsal surface shiny, irregularly punctate. Disc sparsely punctate, distance between two punctures slightly larger than their diameter, punctation laterally denser.

Elytra oval, 1.14-1.18 times as long as wide (Fig. 32), strongly shiny. Striae punctate, intervals flat and wide.



Figs 32-39. 32-34: *Altonomus reitteri* (Stierlin): 32 - pronotum and elytra, dorsal view. Scale = 1.00 mm; 33 – head and rostrum, dorsal view. Scale = 0.50 mm; 34 – sternum 8 in female. Scale = 0.25 mm. 35-39: *A. villosus* (Reitter): 35 – pronotum and elytra, dorsal view. Scale = 1.00 mm; 36 – head and rostrum, dorsal view; 37 – head and rostrum, lateral view. Scale 0.50 = mm; 38 – sternum 8 in female; 39 – spermatheca. Scale = 0.25 mm. Obr. 32-39. 32-34: *Altonomus reitteri* (Stierlin): 32 – štít a krovky, pohled svrchu. Měřítko = 1,00 mm; 33 – hlava s noscem, pohled svrchu. Měřítko = 0,50 mm; 34 – 8. sternit samice. Měřítko = 0,25 mm. 35-39: *A. villosus* (Reitter): 35 – štít a krovky, pohled svrchu. Měřítko = 1,00 mm; 36 – hlava s noscem, pohled svrchu; 37 – hlava s noscem, boční pohled. Měřítko = 0,50 mm; 38 – 8. sternit samice; 39 – spermatéka. Měřítko = 0,25 mm.

Protarsomere 2 twice wider than long, ungular protarsomere gently shorter than protarsomere 3. Metatarsomere 2 1.3-1.5 times as wide as long, ungular metatarsomere gently longer than metatarsomere 3.

Male unknown.

Female genitalia. Plate of sternum 8 trapezoidal; apodeme slightly Y-shaped, divergent apically (Fig. 34). Spermatheca not found in the dissected specimen.

Differential diagnosis. The species is easily recognized by its adherent elytral setae.

Altonomus villosus (Reitter, 1906)
(Figs 35-39)

Mylacus villosus Reitter, 1906: 217.
Altonomus demaisoni Desbrochers, 1907: 95.
Mylacorrhina villosus: Reitter, 1913: 13.
Mylacus villosus: Angelov, 1973: 274.

Type material. Reitter probably described this species on the basis of only one specimen: "Long 3,2 mm", from "Kleinasien", with the following comment: "Von Herrn Desbrochers des Loges mir als *Paramylacus villosus* mitgeteilt". I have found one well-preserved female specimen in Reitter's collection (HNHM), measuring 2.50 mm (r. e.), glued on a small triangular card, and bearing the following labels: Adana [printed] / Asia minor [printed] / Holotypus 1905, Mylacus villosus Reitter [red margins, handwritten, not original label] / M. villosus Reitt. [handwriting], coll. Reitter [printed] / HOLOTYPUS, Mylacus villosus Reitter, R. Borovec desig. 2002 [red, handwritten] / Altonomus villosus (Rtt.), R. Borovec det. 2002 [printed].

This is a valid species.

Additional material examined. 1 ♀, [Turkey] Adana (HNHM); 3 ♀♀, Adana (NMP); 6 ♀♀, Adana (SMT); 1 ♀, Adana (JPE); 1 ♀, [Turkey] Taurus (RBO).

Redescription. Body length (r. e.): 2.84-3.19 mm.

Entire body including antennae and legs light or dark brownish. Elytra with 1) semierect, piliform, rusty brownish or greyish setae, longer than half of width of each interval and creating two irregular rows on each interval and 2) adherent, piliform, greyish, whitish or light brownish setae, shorter than the semierect ones and irregularly scattered on intervals in five to six rows but not completely covering surface. Pronotum and head with long and adherent, piliform whitish setae, transversally directed to midline.

Rostrum 1.13-1.20 times as wide as long, widest at base, with strongly concave sides. Epifrons very narrow, mat and punctured. Frons V-shaped, reaching posterior border of pit-shaped scrobes, feebly shiny, with fine longitudinal striae. Eyes small, strongly convex, hardly protruding from outline of head (Fig. 36).

Antennomere 1 as long as antennomere 2 and only gently wider, both of them twice longer than wide. Antennomere 3 1.39 times as long as wide, antennomere 4 as long as wide, antennomeres 5-7 gently wider than long.

Pronotum 1.22-1.33 times as wide as long, widest in middle or just behind it, with arcuated sides (Fig. 35). Dorsal surface shiny, with coarse and dense, regularly spaced punctures, distance between two punctures strikingly shorter than their diameter.

Elytra short and flat, in dorsal view very shortly obovate, 1.12-1.19 times as long as wide (Fig. 35). Striae finely punctate, intervals flat and wide.

Protarsomere 2 1.43 times as wide as long, ungular protarsomere about as long as protarsomere 3. Metatarsomere 2 1.23 times as wide as long, ungular metatarsomere 1.33 times as long as metatarsomere 3.

Male unknown.

Female genitalia. Sternum 8 with narrow subtrapezoidal plate, feebly sclerotised, apodeme very long, apically contiguous (Fig. 38). Spermatheca with short and wide nodulus and short ramus (Fig. 39).

Differential diagnosis. Easy distinguishable from all other species of the genus by the dense adherent and sparser semierect setae, and densely and coarsely punctate pronotum that is much smaller than elytra.

Altonomus vernalis (Iablokoff-Khnzorian, 1957), **comb. n.**
(Figs 40-47)

Mylacorrhina vernalis Iablokoff-Khnzorian, 1957: 177.

Type material. Iablokoff-Khnzorian (1957) based the description on eight specimens of both sexes from the following Armenian localities: Erevan, Dzhrvezh, Sovietaschen and Shavarut. There are four specimens in HNHM (two males, two females), labelled as follows: 1 ♂, 1 ♀: Armenia, 30.III.1954 [printed] / Sovietaschen [handwritten] / Paratypus, Mylacorrhina vernalis Khnz. [red margins, handwritten, not original label] / Altonomus vernalis (Iablokoff-Khnzorian), R. Borovec det. 2003 [printed]; and 1 ♂, 1 ♀: Erevan, vzhrbezh, ASSR, 29-4-52 [handwritten, in Russian language: Ереван, вжрбеж, АССР] / Cotypus [handwritten] / Mylacorrhina vernalis Khnz. Khnzorian det. [probably Khnzorian's handwriting] / Paratypus, Mylacorrhina vernalis Khnz. [red margins, handwritten, not original label] / Altonomus vernalis (Iablokoff-Khnzorian), R. Borovec det. 2003 [printed]. Genitalia are dissected by author of this paper and mounted on the same label as specimen in males, and on special translucent label attached below specimens in females.

This is a valid species belonging to the genus *Altonomus*.

Redescription. Body length (r. e.): ♂♂ 3.13-3.28 mm, ♀♀ 3.31-3.44 mm.

Body dark brownish, an tennae and legs light brownish. Elytra on each interval with 1) one regular row of long and raised, piliform brownish setae, about as long as interval width and 2) shorter and adherent, piliform whitish setae, creating four irregular rows on each interval but not covering surface. Pronotum and head with semierect, piliform whitish setae, transversally directed to midline.

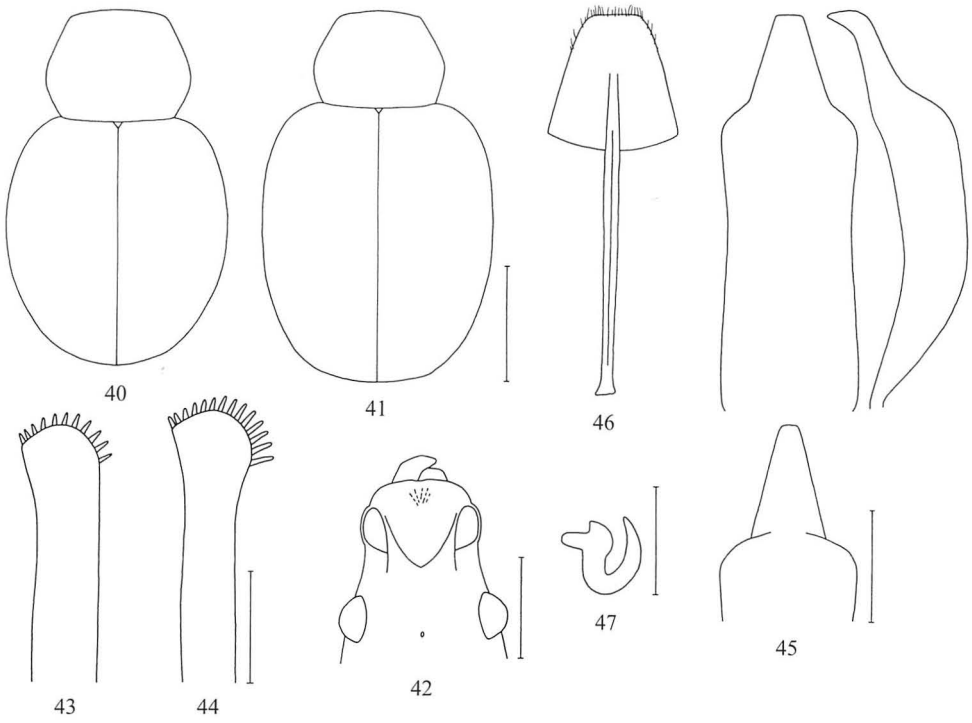
Rostrum wider and shorter in females, 1.19 times as wide as long in males and 1.26-1.31 times as wide as long in females. Rostrum at base distinctly wider than at apex, with concave sides, tapering anteriad. Lateral margins of scrobes strongly arched in dorsal view; anterior half of rostrum with correspondingly arched, strongly rounded sides. Epifrons and head wide, shiny with only several small punctures. Frons extremely large, flat and shiny, with only several sparse punctures, V-shaped, gently exceeding posterior border of pit-shaped scrobes. Ventral margin of scrobe directed towards ventral margin of eye in lateral view. Interocular space with one small puncture in middle. Eyes small and strongly convex, visibly protruding from outline of head (Fig. 42).

Antenna in males slightly more robust than in females. Antennomere 1 in males 1.7 times as long as wide, antennomere 2 1.4 times as long as wide, antennomeres 3 and 4 about as long as

wide, antennomeres 5-7 wider than long, successively wider to apex. Antennomere 1 in females twice longer than wide, antennomere 2 1.8 times as long as wide, antennomeres 3 and 4 1.3 times as long as wide, antennomeres 5-7 wider than long, successively wider to apex.

Pronotum 1.25-1.27 times as wide as long in males and 1.30-1.32 times as wide as long in females, widest behind middle, with strongly rounded sides. Pronotum more robust in males than in females, 0.65-0.66 times as wide as elytra (0.59-0.62 in females) (see Figs 40, 41). Dorsal surface shiny with regularly spaced, coarse and dense punctures, leaving very narrow longitudinal impunctate area, distance between two punctures shorter than their diameter.

Elytra in females suboval, larger in comparison to pronotum, 1.17-1.24 times as long as wide and 2.55-2.61 times as long as pronotum; in males short and globose, smaller in comparison to pronotum, 1.03-1.09 times as long as wide and only 2.19-2.27 times as long as pronotum (Figs 40, 41). Striae punctate, intervals flat, wide.



Figs 40-47. *Altonomus vernalis* (Iablokoff-Khnzorian): 40 – pronotum and elytra in male, dorsal view; 41 – pronotum and elytra in female, dorsal view. Scale = 1.00 mm; 42 – head and rostrum in dorsal view. Scale = 0.50 mm; 43 – apex of protibia in male, dorsal view; 44 – apex of protibia in female, dorsal view; 45 – aedeagus, ventral and lateral view and apex; 46 – sternum 8 in female; 47 – spermatheca. Scale = 0.25 mm.
Obr. 40-47. *Altonomus vernalis* (Iablokoff-Khnzorian): 40 – štít a krovky samce, pohled svrchu; 41 – štít a krovky samice, pohled svrchu. Měřítko = 1,00 mm; 42 – hlava s noscem, pohled svrchu. Měřítko = 0,50 mm; 43 – špice pravé přední holeně samce, pohled svrchu; 44 – špice pravé přední holeně samice, pohled svrchu; 45 – aedeagus, spodní a boční pohled, špice; 46 – 8. sternit samice; 47 – spermatéka. Měřítko = 0,25 mm.

Tarsi in males much more robust than in females. Protarsus in both sexes more robust than metatarsus, in males extremely robust with tarsomere 2 2.5 times as wide as long and ungular tarsomere gently shorter than previous one. Male metatarsomere more slender, 1.7 times as wide as long with ungular tarsomere gently longer than tarsomere 3. Protarsomere 2 in females 1.8 times as wide as long, ungular protarsomere 1.4 times as long as previous one. Female metatarsomere 2 1.4 times as wide as long, ungular metatarsomere 1.8 times as long as metatarsomere 3.

Male genitalia. Aedeagus in ventral view in basal two thirds almost parallel-sided, in apical third constricted and evenly tapering to a blunt apex, in lateral view iregularly curved, in apical third forming slender long point curved inside just in apex (Fig. 45).

Female genitalia. Plate of sternum 8 trapezoidal, feebly sclerotised. Apodeme apically contiguous (Fig. 46). Spermatheca with long ramus and short nodulus (Fig. 47).

Differential diagnosis. *Altonomus vernalis* is easily distinguishable from all other species of the genus by its long raised elytral setae combined with shorter adherent setae, wide epifrons, large shiny frons, and scrobes in lateral view being directed towards the eye. It is externally somewhat similar to *A. modestus*, but is easily distinguished from the latter by the shiny and impunctate epifrons and head, presence of raised elytral setae and slender funicle.

Altonomus modestus (Iablokoff-Khnzorian, 1957), **comb. n.**
(Figs 48-51)

Mylacorrhina modesta Iablokoff-Khnzorian, 1957: 178.

Type material. I have not seen the type specimens that should be deposited in author's collection. Iablokoff-Khnzorian (1957) described this species based on six specimens (three males and three specimens without sex distinguishing) from Armenia from three localities: Schorbulakh near Erevan, Sovietaschen, and Dzhrvezh. However, I have examined one female in the collection of O. Voříšek (see below) which fits the description very closely and comes from the eastern part of Turkey, not far from these localities. Thus, the redescription is based on this single female; the identity of this species should be verified by the examination of type material.

Additional material examined. 1 ♀, Turkey, Anatolia centr. or., Askale, 8.vi.1992, S. Kadlec lgt. (OVO).

Redescription. Body length (r. e.): 2.84-3.19 mm.

Body blackish, antennae and legs brown reddish, femora and antennal clubs darker. Elytra, pronotum and head with long and dense, semierect piliform setae. Setae brownish or greyish with feeble metallic lustre, irregularly mixed. Setae on pronotum transversely directed to midline.

Rostrum 1.21 times as wide as long, widest at base, in basal half very strongly tapering anteriad, in anterior half very gently enlarged anteriad, almost parallel-sided. Epifrons narrow, in narrowest part less than 0.5 times as wide as rostrum in the same place. Frons large, V-shaped, gently exceeding antennal insertions, shiny with several punctures, feebly impressed. Eyes small and convex, feebly protruding from outline of head (Fig. 49). Epifrons and head very densely and finely punctate, space between two punctures smaller than their diameter.

Antennomere 1 slightly longer and wider than antennomere 2; antennomeres 3-7 strikingly wider than long, successively wider to apex; antennomeres 6-7 about twice wider than long.

Pronotum 1.43 times as wide as long, with strongly rounded sides, widest in posterior third (Fig. 48). Dorsal surface with large and very small punctures, distance between two large punctures strikingly shorter than their diameter, with very small and fine punctures between large punctures.

Elytra oval, 1.24 times as long as wide, sides rather evenly rounded (Fig. 48). Striae finely punctate, intervals flat and very wide.

All tarsi with tarsomere 2 1.4 times as wide as long, tarsomere 3 bilobed and wider than previous one, ungular tarsomere 1.6 times as long as tarsomere 3. According to the original description, tarsi in both sexes should have the same shape, as in females of *A. vernalis*.

Male unknown to me.

Female genitalia. Plate of sternum 8 subtriangular, apex deeply emarginate (Fig. 50). Nodulus of spermatheca shorter than ramus (Fig. 51).

Differential diagnosis. *Altonomus modestus* is very easily distinguishable from all other species of *Altonomus* by its dense semierect setae on elytra, very densely punctate pronotum, and antennomeres 3-7 being strikingly wider than long. It is externally somewhat similar to *A. vernalis*; see the differential diagnosis of the latter for distinguishing characters between these two species.

Altonomus jelineki sp. n.

(Figs 2, 52-54)

Type material. Holotype: ♂, Palestyna [= Israel], Rosy Pina [= Rosh Pina, Upper Galilee, NW of Kineret], 27.xii.25 (NMP).

Description. Body length (r. e.): 2.38 mm.

Entire body light brownish except of black eyes. Elytra sparsely covered by semierect piliform yellowish setae with feeble bronze lustre, setae slightly longer than half of width of one interval, creating two regular rows on each interval and one row in each stria. Pronotum and head with similar but shorter and almost adherent setae, setae on pronotum directed transversely to midline. Legs and antennae with short semierect piliform setae (Fig. 2).

Rostrum about as long as wide, with very strongly concave sides, apex only gently narrower than base. Epifrons narrow, tapering posteriad, with feebly concave margins, punctate. Frons shiny, curved ventrally, slightly angular in lateral view, reaching posterior border of pit-shaped scrobes, with feeble and shallow V-shaped depression. Epistome not differentiated. Rostrum in lateral view vaulted. Scrobes in dorsal view visible and open, in lateral view short and enlarged, their ventral margin curved down and not reaching ventral margin of rostrum. Eyes small, strongly convex, protruding from outline of head (Fig. 53).

Antenna slender. Scape long, exceeding anterior margin of pronotum, curved, feebly thickened towards apex. Funicle slender. Antennomeres 1 and 2 almost identical, 1.7-1.8 times as long as wide; antennomeres 3-5 about as long as wide; antennomere 6 gently and antennomere 7 visibly wider than long. Club long and slender, 1.9 times as long as wide, almost as long as antennomeres 4-7 combined (Fig. 2).

Pronotum 1.29 times as wide as long, strongly and regularly vaulted, widest in basal third, with strongly rounded sides, anterior margin narrower than posterior one (Fig. 52). Entire surface densely punctate, intervals between punctures shorter than their diameter (Fig. 2).

Scutellum small and triangular (Fig. 2).

Elytra shortly oval, 1.14 times as long as wide, with strongly rounded sides, shiny (Fig. 52). Striae finely punctate, intervals flat and wide (Fig. 2).

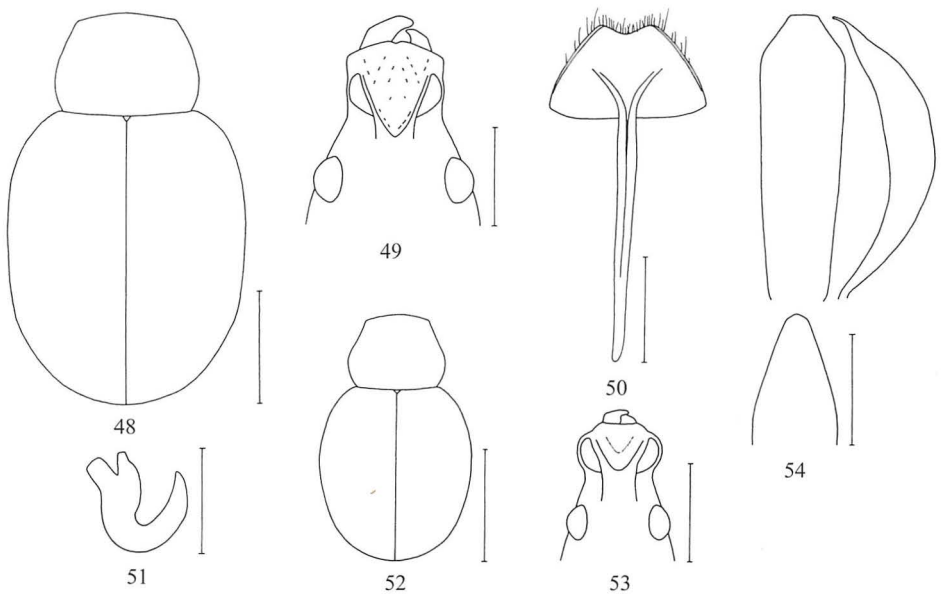
Femora inermis. Tibiae long and slender. Apex of protibia rounded at outer side and strongly enlarged at inner side, with a fringe of very short yellowish setae. Mesotibia with very short and metatibia with short and small, fine spine at inner side. Protarsus more robust than mesotarsus, mesotarsus more robust than metatarsus. Protarsomere 2 2.3 times as wide as long, protarsomere 3 almost twice as long as ungular one. Metatarsomere 2 1.9 times as wide as long, metatarsomere 3 as long as ungular one. Claws free (Fig. 2).

Male genitalia. Aedeagus in ventral view widest in anterior third, strongly tapered to truncate apex, in lateral view regularly curved, tapering into a rather long and very narrow, pointed apex (Fig. 54).

Collection circumstances. Unknown.

Etymology. This new species is dedicated, with great pleasure, to Dr. Josef Jelínek from the National Museum in Prague, a prominent Czech coleopterologist and specialist in Nitidulidae.

Differential diagnosis. *Altonomus jelineki* sp. n. is easy distinguishable from all other species of the genus by having only semierect setae on the elytra and finely and densely punctured pronotum.



Figs 48-54. 48-51: *Altonomus modestus* (Iablokoff-Khnzorian): 48 – pronotum and elytra, dorsal view. Scale = 1.00 mm; 49 – head and rostrum, dorsal view. Scale = 0.50 mm; 50 – sternum 8 in female; 51 – spermatheca. Scale = 0.25 mm. 52-54: *A. jelineki* sp. n.: 52 – pronotum and elytra, dorsal view. Scale = 1.00 mm; 53 – head and rostrum, dorsal view. Scale = 0.50 mm; 54 – aedeagus, ventral and lateral view and apex. Scale = 0.25 mm. Figs 48-54. 48-51: *Altonomus modestus* (Iablokoff-Khnzorian): 48 - štít a krovky, pohled svrchu. Měřítko = 1,00 mm; 49 – hlava s noscem, pohled svrchu. Měřítko = 0,50 mm; 50 – 8. sternit samice; 51 – spermatéka. Měřítko = 0,25 mm. 52-54: *A. jelineki* sp. n.: 52 – štít a krovky, pohled svrchu. Měřítko = 1,00 mm; 53 – hlava s noscem, pohled svrchu. Měřítko = 0,50 mm; 54 – aedeagus, spodní a boční pohled, špice. Měřítko = 0,25 mm.

Key to the species of *Altonomus*

1. Elytra with adherent and raised, or adherent and semierect setae. 2
– Elytra with only adherent or only semierect setae. 3
2. Elytra with semierect and adherent setae. Ventral border of scrobe directed below ventral margin of eye. Frons feebly shiny with fine longitudinal striae in the middle (Fig. 36). Head and epifrons densely and coarsely punctate. Body length 2.8-3.2 mm. ..... *A. villosus* (Reitter)
– Elytra with raised and adherent setae. Ventral border of scrobe directed towards ventral margin of eye. Frons strongly shiny and flat, without surface structures (Fig. 42). Head and epifrons shiny with small isolated punctures. Body length 3.1-3.4 mm. ..... *A. vernalis* (Iablokoff-Khnzorian)
3. Elytra with adherent setae. Pronotum shiny with sparse punctures on disc, intervals between two punctures larger than their diameter. Body length 2.6 mm. ..... *A. reitteri* (Stierlin)
– Elytra with semierect setae. Pronotum mat with dense punctures on disc, intervals between two punctures smaller than their diameter. 4
4. Rostrum in anterior half subparallel-sided (Fig. 49). Antennomeres 3-5 strikingly wider than long. Elytra densely and irregularly covered by greyish and brownish semierect setae. Body length 2.8-3.2 mm. .... *A. modestus* (Iablokoff-Khnzorian)
– Rostrum in anterior half strikingly enlarged anteriad (Fig. 53). Antennomeres 3-5 about as long as wide. Elytra with two regular rows of yellowish semierect setae on each interval (Fig. 2). Body length 2.4 mm. . ..... *A. jelineki* sp. n.

CHECK-LIST

***Gyratogaster* K. Daniel et J. Daniel, 1903**	
G. comosa K. Daniel et J. Daniel, 1903, stat. rest.	Turkey
? *G. discretus* Voss, 1943	Turkey, Lebanon
G. larinoides (Reitter, 1896)	Turkey
G. podlussanyi sp. n.	Turkey
G. rufithorax Pesarini, 1975	Turkey
***Leianisorhynchus* Pic, 1905**	
L. brunnescens Pic, 1905	Turkey, Syria
L. wittmeri (Pesarini, 1971), comb. n.	Turkey
***Altonomus* Desbrochers, 1907**	
= *Mylacorrhina* Reitter, 1913	
= *Mylacorhina* Lona, 1937	
A. jelineki sp. n.	Israel
A. modestus (Iablokoff-Khnzorian, 1957), comb. n.	Turkey, Armenia
A. reitteri (Stierlin, 1884)	Israel
A. vernalis (Iablokoff-Khnzorian, 1957), comb. n.	Armenia
A. villosus (Reitter, 1906)	Turkey
= *A. demaisoni* Desbrochers, 1907	

ACKNOWLEDGEMENTS. I wish to gratefully thank to the following persons who helped me with loans of material and bibliography: L. Behne, DEI; S. Benedikt, Starý Plzenec; C. Brancucci, NMB; R. Caldara, Milano; J. Fremuth, Hradec Králové; A. L. L. Friedman, TAU; J. Frisch, MNHU; J. Jelínek, NMP; I. Kovář, NMP; R. Krause, SMT; O. Merkl, HNHM; J. Pelletier, Monnaie; C. Pesarini, Milano; A. Podlussány, Budapest; Gy. Szél, HNHM and O. Voříšek, Kladno. Special thanks are due to J. Vitner (Prague) for his critical comments and to D. Boukal (České Budějovice) for linguistic help.

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SOUHRN

Rody *Gyratogaster* K. Daniel et J. Daniel, 1903, *Leianisorhynchus* Pic, 1905 a *Altonomus* Desbrochers, 1907 patří k nejméně známým rodům nosatců. Do vzniku této práce bylo 9 z 10 druhů známo pouze z typového materiálu a většina taxonů byla kromě údajů v katalozích od dob popisu prakticky neznáma. Díky možnosti revize typového materiálu většiny popsaných druhů a studiu nevelkého nově sbíraného materiálu bylo možno zrevidovat druhovou a rodovou systematiku těchto tří podobných a blízce příbuzných rodů.

Rody *Gyratogaster* a *Leianisorhynchus* byly v současné době řazeny do tribu Omiini Shuckard, 1840. Vzhledem k tomu, že jedním z hlavních znaků tribu Omiini jsou na basi srostlé drápky chodidel a všechny druhy rodů *Gyratogaster* a *Leianisorhynchus* mají drápky volné, je nutné tyto dva rody přeřadit do tribu Cyphicerini Lacordaire, 1863. V tomto tribu patří

do subtribu Mylacorrhinina Reitter, 1913 společně s rodem *Altonomus*. Jejich společnými znaky jsou nosec s výrazně oddělenou, lesklou a dolů skloněnou špicí a tělo bez šupin.

Tato práce uvádí přehled všech dosud známých druhů studovaných rodů včetně redeskripcí a ilustrací důležitých rozlišovacích znaků. Poprvé jsou u těchto rodů a druhů studovány samčí a samičí genitálie. Jsou zde popsány dva nové druhy: *Gyratogaster podlussanyi* sp. n. z Turecka a *Altonomus jelineki* sp. n. z Izraele. Poprvé jsou zde popsáni samci rodu *Gyratogaster*, a to samci druhů *G. rufithorax* Pesarini, 1975 a *G. podlussanyi* sp. n. Práce je doplněna určovacími klíči rodů a druhů a check-listem se stručným přehledem dosud známého rozšíření jednotlivých druhů.

Klíč rodů subtribu Mylacorrhinina

1. Špice přední holeně u samic na vnější straně slabě rozšířená, u samců zaokrouhlená (obr. 43, 44). Nosec ve stejné rovině s čelem (obr. 37). Apodema 8. sterna u samic končí uvnitř desky, netvoří basální okraj (obr. 34, 38, 46, 50). Menší druhy, délka těla 2,4-3,4 mm. ..... *Altonomus* Desbrochers
– Špice přední holeně u samic silně, u samců slabě rozšířená na vnější straně (obr. 15, 16). Nosec oddělen od čela mělkou nebo hlubokou příčnou rýhou (obr. 14, 25). Apodema 8. sterna u samic tvoří zřetelný basální okraj (obr. 5, 9, 18, 26, 30). Větší druhy, délka těla 3,3-6,8 mm. 2
2. Apikální plocha nosce malá, dosahuje nebo pouze nepatrně přesahuje zadní okraj tykadlových jamek (obr. 4, 8, 13, 21). Nosec oddělen od hlavy mělkou příčnou rýhou (obr. 14). Nodulus spermatéky krátký, zhruba stejně dlouhý jako ramus, výrazně kratší než cornu (obr. 6, 10, 19). Délka těla 3,3-6,8 mm. ..... *Gyratogaster* K. Daniel et J. Daniel
– Apikální plocha nosce velká, téměř dosahuje k přednímu okraji očí (obr. 24, 29). Nosec oddělen od hlavy hlubokou příčnou rýhou (obr. 25). Nodulus spermatéky extrémně dlouhý, výrazně delší než ramus, zhruba téže délky jako cornu (obr. 27, 31). Délka těla 3,9-6,8 mm. ..... *Leianisorhynchus* Pic

Klíč druhů rodu *Gyratogaster*

1. Stehna se zoubky. Délka těla 6,0-6,8 mm. ..... *G. discretus* Voss
– Stehna bez zoubků. 2
2. Dorsální plocha štítu lesklá, bez jamek. Délka těla 3,7-4,1 mm. ..... *G. larinoides* (Reitter)
– Dorsální plocha štítu řídce nebo hustě jamkovaná. 3
3. Štít a krovky s velmi hustými přiléhajícími i odstávajícími chlupy. Štít velmi hustě jamkovaný, matný, vzdálenost mezi dvěmi jamkami mnohem menší než průměr jamky. Délka těla 3,7-4,6 mm. ..... *G. comosa* K. Daniel et J. Daniel
– Štít a krovky lysé, s dlouhými, odstávajícími chlupy a s velmi řídkými, krátkými, odstávajícími nebo polovzpřímenými chlupy pod nimi. Štít velmi řídce jamkovaný, lesklý, vzdálenost mezi dvěmi jamkami výrazně větší než průměr jamky. 4
4. Stehna hnědavě červená. Krovečné rýhy s oddělenými jamkami. Nosec silně klenutý, vrchní plocha oddělená od hlavy viditelnou příčnou rýhou. Štít u samců robustní, téměř stejně široký jako krovky, krovky 1,71-1,84x delší než štít (obr. 11). Špice aedeagu z pohledu ventrálního i laterálního dlouhá (obr. 17). Délka těla 3,7-4,4 mm. ..... *G. rufithorax* Pesarini
– Stehna černá. Krovečné rýhy bez viditelných jamek. Nosec slabě klenutý, vrchní plocha oddělená od hlavy jen neznatelně. Štít u samců méně robustní, štíhlejší než krovky, krovky 2,00x delší než štít (obr. 20). Špice aedeagu z pohledu ventrálního i laterálního krátká (obr. 22). Délka těla 3,3 mm. ..... *G. podlussanyi* sp. n.

Klíč druhů rodu *Leianisorhynchus*

1. Šířka nosce větší než jeho délka (obr. 24). Štít řídce jamkovaný, vzdálenost dvou jamek mnohem větší než průměr jamky. Tykadla krátká, 2. antennomera kratší než první, 3. antennomera stejně dlouhá jako široká. Krovečné mezery s bělavými, poloodstávajícími chlupy. Nodulus spermatéky v celé délce zahnutý, ramus delší než široký (obr. 27). Menší druh, délka těla 3,9-4,6 mm. ..... *L. brunnescens* Pic

– Nosec stejně dlouhý jako široký (obr. 29). Štít hustě jamkovaný, vzdálenost dvou jamek menší než průměr jamky. Tykadla štíhlá, 2. antennomera stejně dlouhá nebo trochu delší než první, 3. antennomera delší než široká. Mezirýží krovek s hnědavými, dlouhými, poloodstávajícími chlupy a s bílými, krátkými, přiléhajícími chloupky vespod. Nodulus spermatéky přímý, zahnutý pouze na špici, ramus stejně dlouhý jako široký (obr. 31). Větší druh, délka těla 6,3-6,8 mm. ..... *L. wittmeri* (Pesarini)

Klíč druhů rodu *Altonomus*

1. Krovky s přiléhajícími a odstávajícími nebo s přiléhajícími a poloodstávajícími chlupy. 2
– Krovky pouze s odstávajícími nebo poloodstávajícími chlupy. 3
2. Krovky s poloodstávajícími a přiléhajícími chlupy. Ventrální okraj tykadlové rýhy zahnutý dolů pod oko. Apikální plocha nosce slabě lesklá, s jemnými podélnými rýžkami (obr. 36). Hlava a vrchní plocha nosce hustě a hrubě tečkovaná. Délka těla 2,8-3,2 mm. ..... *A. villosus* (Reitter)
– Krovky s odstávajícími a přiléhajícími chlupy. Ventrální okraj tykadlové rýhy míří ke spodnímu okraji oka. Apikální plocha nosce silně lesklá, bez povrchové struktury (obr. 42). Hlava a vrchní plocha nosce lesklá s malými isolovanými jamkami. Délka těla 3,1-3,4 mm. ..... *A. vernalis* (Iablokoff-Khnzorian)
3. Krovky s přiléhajícími chlupy. Štít lesklý, s řídkými jamkami uprostřed, vzdálenost mezi nimi větší než jejich průměr. Délka těla 2,6 mm. ..... *A. reitteri* (Stierlin)
– Krovky s poloodstávajícími chlupy. Štít matný, uprostřed s hustými jamkami, vzdálenost mezi nimi menší než jejich průměr. 4
4. Nosec v terminální polovině skoro paralelní (obr. 49). Antennomera 3-5 výrazně širší než dlouhá. Krovky hustě a nepravidelně pokryty šedými a hnědými poloodstávajícími chlupy. Délka těla 2,8-3,2 mm. ..... *A. modestus* (Iablokoff-Khnzorian)
– Nosec v terminální polovině výrazně dopředu rozšířený (obr. 53). Antennomera 3-5 zhruba stejně dlouhá jako široká. Krovky se dvěmi pravidelnými řadami žlutavých, poloodstávajících chlupů na každém mezirýží. Délka těla 2,4 mm. ..... *A. jelineki* sp. n.