

# A Review of the Curculionoidea (Coleoptera) from European Eocene Ambers

Andrei A. Legalov <sup>1,2</sup>

<sup>1</sup> Institute of Systematics and Ecology of Animals, Siberian Branch, Russian Academy of Sciences, Frunze Street 11, 630091 Novosibirsk, Russia; fossilweevils@gmail.com; Tel.: +7-9139471413

<sup>2</sup> Biological Institute, Tomsk State University, Lenina Prospekt 36, 634050 Tomsk, Russia

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**Abstract:** All 142 known species of Curculionoidea in Eocene amber are documented, including one species of Nemonychidae, 16 species of Anthribidae, six species of Belidae, 10 species of Rhynchitidae, 13 species of Brentidae, 70 species of Curculionidae, two species of Platypodidae, and 24 species of Scolytidae. Oise amber has eight species, Baltic amber has 118 species, and Rovno amber has 16 species. Nine new genera and 18 new species are described from Baltic amber. Four new synonyms are noted: *Palaeometrioxena* Legalov, 2012, **syn. nov.** is synonymous with *Archimetrioxena* Voss, 1953; *Paleopissodes weigangae* Ulke, 1947, **syn. nov.** is synonymous with *Electrotribus theryi* Hustache, 1942; *Electrotribus erectosquamata* Rheinheimer, 2007, **syn. nov.** is synonymous with *Succinostyphlus mroczkowskii* Kуска, 1996; *Protonaupactus* Zherikhin, 1971, **syn. nov.** is synonymous with *Paonaupactus* Voss, 1953. Keys for Eocene amber Curculionoidea are given. There are the first records of Aedemonini and Camarotini, and genera *Limalophus* and *Cenocephalus* in Baltic amber.

**Keywords:** Coleoptera; Curculionoidea; fossil weevil; new taxa; keys; Palaeogene

## 1. Introduction

The Curculionoidea are one of the largest and most diverse groups of beetles, including more than 62,000 species [1] comprising 11 families [2,3]. They have a complex morphological structure [2–7], ecological confinement, and diverse trophic links [1], which makes them a convenient group for characterizing modern and fossil biocenoses. The oldest Curculionoidea are described from the Middle Jurassic of China [8] and the Middle–Upper Jurassic of Kazakhstan [2,8–12]. The major families appear in the Lower Cretaceous [2,13–17], while the major subfamilies occur in the Palaeogene [2,17].

The Eocene ambers of Europe with Curculionoidea include the Earliest Eocene Oise amber and Late Eocene Baltic and Rovno ambers. Oise amber Coleoptera were first studied by Kirejtshuk and Nel [18], while the first weevil from Oise amber was described in the Brentidae [19]. In 2019, a review of weevils of the families Brentidae and Curculionidae from Oise amber was published [20]. The first Curculionoidea from Baltic amber was *Hylesinites electrinus* Germar, 1813 (Scolytidae) [21]. The second species from Baltic amber was described by Motschulsky in 1857 [22]. Unfortunately, it is not possible to establish a more accurate systematic position of *Eirrhinoides cariniger* Motschulsky, 1857 based on its brief description [22], and the collection where the holotype was stored was lost. A review of Baltic amber bark beetles was given by Schedl [23], which is still the only general work on Baltic amber bark beetles. Voss [24,25] and Zherikhin [26] described many weevils from Baltic amber in three articles [24–26]; later, 15 species were also described [27–37]. In 2012, the present author began a study of the Curculionoidea in Baltic amber [2,38–53] and described 48 species. Data on Curculionoidea are also given in general works devoted to amber [54–58], catalogs [59,60], and

descriptions in scientific collections [61–63]. The curculionoid fauna from Eocene Rovno amber represented by three families, despite recent work [64–73], remains insufficiently studied.

This review summarizes all previous information about Curculionoidea from Eocene amber, provides keys for currently described species from Eocene amber, comments on the identification of taxa, and also describes new taxa.

## 2. Materials and Methods

The Baltic amber mines are located along the Baltic Sea coast mostly at the Amber quarry of Yantarny (former Palmnicken) near Kaliningrad in the Kaliningrad Region (Russia). Baltic amber from the Prussian Formation dates 34–48 million years old [74]. The amber from this deposit was probably produced by *Pinus succinifera*, *Cerinus*, *Pseudolarix* (Pinaceae), *Agathis* (Araucariaceae), *Sciadopitys* (Sciadopityaceae) (Sadowski et al. 2016) [75–79], or other trees.

Rovno amber is found in the Rovno Region (Ukraine) [80]. The amber dates the Late Eocene (Priabonian) [80,81]. The plant producing this amber is possibly the same as Baltic amber.

The Oise amber deposit is located near the town of Creil at a place known as “Le Quesnoy” (Paris Basin, Creil, Oise, France). The age of this site was estimated as Lowermost Eocene (about 53 Ma) [82]. The amber-producing tree is *Aulacoxylon sparnacense* (Combretaceae or Caesalpiniaceae), which could be related to extant *Terminalia* L. (Combretaceae) or Fabaceae–Caesalpiniaceae [83].

The type specimens and material considered below are housed in the following collections: (ABCD) A. Bukejs’s collection, Daugavpils, Latvia; (ANSP) Department of Entomology, Academy of Natural Sciences, Philadelphia, United States of America (USA); (CAGB) A. Górski’s collection, Bielsko-Biala, Poland; (CCMCL) Centre de Conservation du musée des confluences, Lyon, France; (CVGM) V. Gusakov’s collection, Russia, Moscow; (CVIA) V. Alekseev’s collection, Kaliningrad, Russia; (EIW) Earth Institute, Warsaw, Poland; (FEH) Friedhelm Eichmann, Hannover, Germany; (FKCH) F. Kernegger’s collection, Hamburg, Germany, deposited in the Forschungsinstitut Senckenberg, Frankfurt am Main, Germany; (GMPB) Górnośląskie Muzeum Przyrodnicze w Bytomiu, Poland; (GPIH) Center of Natural History (formerly Geological–Paleontological Institute and Museum), Hamburg, Germany; (GPIHG) C. Gröhn’s collection (Glinde, Germany) deposited in the Center of Natural History (formerly Geological–Paleontological Institute and Museum), Hamburg, Germany; (HCH) Ch. and H. W. Hoffeins’s collection, Hamburg, Germany; (ISEA) A. Legalov’s fossil insects collection maintained at Institute of Systematics and Ecology of Animals of the Siberian Branch of the Russian Academy of Science, Novosibirsk, Russia; (KRAM) Kaliningrad Regional Amber Museum, Kaliningrad, Russia; (MAIG) Museum of Amber Inclusions, University of Gdańsk, Poland; (MLUH) Martin Luther University, Halle, Germany; (MNHN) Muséum national d’histoire naturelle, Paris, France; (MWOK) Museum of the World Ocean, Kaliningrad, Russia; (PACO) Poinar amber collection maintained at Oregon State University, Corvallis, OR, USA; (PIN) Borissiak Paleontological Institute of the Russian Academy of Sciences, Moscow, Russia; (SDEI) Senckenberg Deutsches Entomologisches Institut, Müncheberg, Germany; (SFNF) Senckenberg Forschungsinstitut und Naturmuseum, Frankfurt, Germany; (SIZK) Schmalhausen Institute of Zoology of the National Academy of Sciences of Ukraine, Kiev, Ukraine; (SMNK) Staatliches Museum für Naturkunde, Karlsruhe, Germany; (SMNS) Staatlichen Museums für Naturkunde Stuttgart, Germany; (ZMHB) Museum für Naturkunde, Leibniz-Institut für Evolutions-und Biodiversitätsforschung, Berlin, Germany; (ZMUC) Zoological Museum, University of Copenhagen, Denmark.

Descriptions and photographs were produced using Leica and Zeiss Stemi 2000-C stereomicroscopes. Photographs 1a–1d, 1f–1i, 2a–2i, 3a, 3d–3g, 4a–4h, 4j, 5a–5j, 6a–6c, 6i–6m, 7a–7f, 7h–7k, 8a–8k, 9a–9f, 10a–10i, 11a, 11d, 11e, 11h–11j, and 12a–12i were taken by the author, while photographs 1e, 3b, 3c, 3h, 4i, 6d–6g, 7g, 11b, 11c, 11f, 13c, and 13g were received from Ulrich Kotthoff and Eva Vinx (Germany: Hamburg), photographs 5k, 5l, and 6h were received from Didier Berthet (Lyon), photographs 7h, 8d, and 11g were received from Katarzyna Szczepaniak (Poland: Warsaw).

The spectra of laser-induced fluorescence (LIF) of some samples were examined with the assistance of N.A. Maslov (Khristianovich Institute of Theoretical and Applied Mechanics of the Siberian Branch of the RAS) to confirm their origin.

Taxa known from amber from references without author examination are included in square brackets whose identity should be clarified by further re-examination.

The systematics of studied taxa are from Legalov's works [2,3,84–88]. The terminology of weevil morphological structures is based on Lawrence et al. [89].

Nomenclatural acts introduced in the present work are registered in ZooBank (www.zoobank.org) under LSID urn:lsid:zoobank.org:pub: AF69581E-33D5-4EEB-9B71-60945570065B.

### 3. Results

Superfamily **Curculionoidea** Latreille, 1802

**Key to families of superfamily Curculionoidea in Eocene amber**

1. Head ventrally with preular sutures. Rostral pleurostomal sinus shallow. Rostrum reduced. Tibiae with denticles on outer margin.....2
  - Head ventrally lacking preular sutures. Rostral pleurostomal sinus usually deep; as exception, it can be shallow (Nemonychidae, Attelabidae). Rostrum distinct. Tibiae lacking denticles on outer margin.....3
2. Preular sutures parallel to exterior margin of hypostomal sinus. Tibiae with denticles on outer margin. Head narrower than pronotum. Tarsomere 1 shorter than tarsomeres 2–5 combined. Club with sutures.....Scolytidae
  - Preular sutures continued anteriorly to hypostomal margin at bottom of hypostomal sinus. Tibiae with transverse carinae on outer margin. Head as wide as pronotum. Tarsomere 1 longer than tarsomeres 2–5 combined. Club without sutures.....Platypodidae
3. Labrum free. Maxillary palpi elongate.....4
  - Labrum fused to head.....5
4. Rostral pleurostomal sinus shallow. Pygidium absent. All five ventrites completely free. Tibiae with spurs.....Nemonychidae
  - Rostral pleurostomal sinus deep. Pygidium present and exposed. Ventrites 1–4 fused to greater or lesser extent, if free than pygidium exposed. Tibiae lacking spurs.....Anthribidae
5. Antennae geniculate.....6
  - Antennae straight.....7
6. Trochanters extended. Ventrites 1 and 2 and ventrites 3–5 oriented in different planes. Tibiae without uncus. ....Brentidae (Nanophyinae)
  - Trochanters short. Ventrites 1–5 oriented in one plane. Tibiae with uncus, if without uncus than ventrites 1–5 oriented in one plane. ....Curculionidae
7. Protibiae with wide apical groove and thick hairs on inner surface at point of tarsal attachment. Antennal scrobes absent. All five ventrites free. Tarsomeres 1–3 bilobed.....Belidae
  - Protibiae simple. Antennal scrobes distinct. At least ventrites 1 and 2 fused. Tarsomere 3 bilobed.....8
8. Ventrites 1 and 2 fused and elongate, and ventrites 3 and 4 shortened.....Brentidae (without Nanophyinae)
  - Ventrites more or less of similar length.....9
9. Claws free at base. Tibiae of females at apex simple or with small mucro. Internal edge of protibiae without teeth. Mandible with teeth at external edge..... Rhynchitidae
  - Claws fused at base. Tibiae of females at apex with large mucro. Internal edge of protibiae with fine teeth. Mandible without teeth at external edge. .... [Attelabidae]

**Nemonychidae** Bedel, 1882

**Cimberidinae** Gozis, 1882

**Kuschelomacerini** Riedel, 2010

Genus *Kuschelomacer* Riedel, 2010

Type species: *Kuschelomacer kerneggeri* Riedel, 2010

*Kuschelomacer kerneggeri* Riedel, 2010

Riedel [35]: 32–36, Figures 1–13 therein.

**Locality.** Baltic amber.

**Remarks.** The holotype of this species deposited in FKCH.

**Anthribidae** Billberg, 1820

**Key to subfamilies of Anthribidae in Eocene amber**

1. Elytra lacking striae. Tarsomere 2 simple. Transverse carina absent. Ventriles free..... [Urodontinae]
  - Elytra striate. Tarsomeres 2 partially embracing tarsomere 3 laterally. Transverse carina usually distinct, subbasal or basal. Ventriles 1–4 fused to some extent.....2
2. Antennae inserted dorsally between or next to lower portion of eyes.....Choraginae
  - Antennae inserted laterally or ventrally on rostrum.....Anthribinae

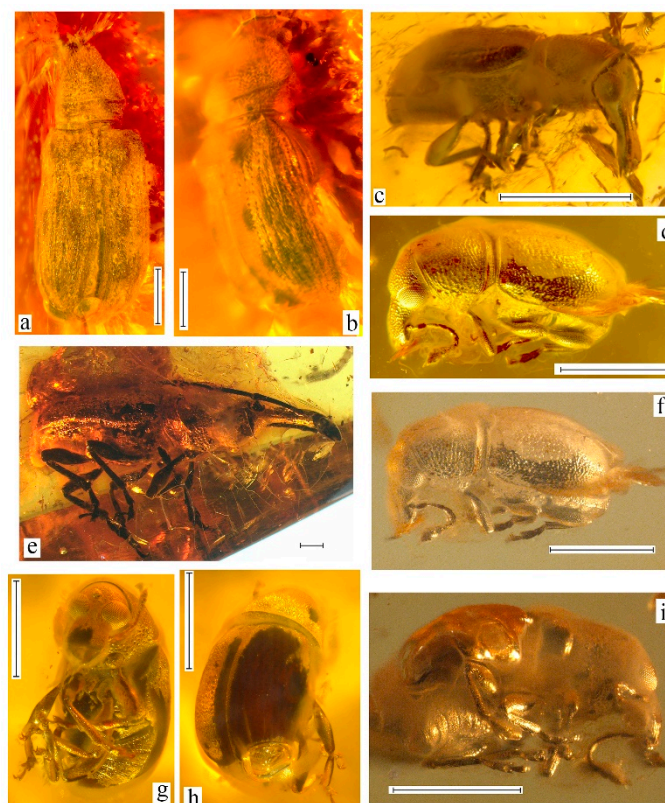
[Urodontinae C. G. Thomson, 1859]

**Remarks.** This is an undescribed representative of the subfamily recorded from Baltic amber [62].

**Anthribinae** Billberg, 1820

**Key to tribes of Anthribinae in Eocene amber**

1. Eyes coarsely faceted.....Oiserhinini
  - Eyes finely faceted.....2
- 2 Rostrum shorter or equal in width.....Zygaenodini
  - Rostrum longer than wide.....3
3. Antennal scrobes dorso-lateral partially visible from above.....Mecocerini
  - Antennal scrobes ventral or lateral, not visible from above.....4
4. Rostrum perpendicular. Underside of head angulate to rostrum in profile.....[Tropiderini]
  - Rostrum directing antero-ventrally. Underside of head continuous to rostrum and forming an arc in profile.....Allandrini



**Figure 1.** Habitus of Anthribinae from Baltic amber. (a,b) *Pseudomecocerus alekseevi* gen. et sp. nov., holotype, KRAM, no. 6328: body, dorsally (a); body, laterally (b). (c) *Allandroides vossi*, holotype, ISEA, no. BA2012/11, body, laterally. (d,f,i) *Glaesotropis balticus* sp. nov., holotype, FEH, no. 656: body, dorso-laterally (d); body, laterally (f); body, latero-ventrally (i). (e) *Pseudomecorhis simulator*, holotype, GPIH, no. 193, body, laterally; (g,h) *G. martynovi*, holotype, PIN, no. 964/1235: body, ventrally (g); body, dorsally (h). Scale bars: 1.0 mm. See Section 2 for names of collections.

**Oiserhinini** Legalov, Kirejtshuk et Nel, 2019

Genus *Oiserhinus* Legalov, Kirejtshuk et Nel, 2019

Type species: *Oiserhinus insolitus* Legalov, Kirejtshuk et Nel, 2019

*Oiserhinus insolitus* Legalov, Kirejtshuk et Nel, 2019

Legalov et al. [20]: 64, 67, Figure 1a–e therein, plate 17, Figures 1–4 therein.

**Locality.** Oise amber.

**Remarks.** This species is known only by the holotype (MNHN).

**Mecocerini** Lacordaire, 1865

Genus *Pseudomecocerus* gen. nov.

urn:lsid:zoobank.org:act:107F7197-3237-4BA2-9B05-B921848119D7

Type species: *Pseudomecocerus alekseevi* sp. nov.

**Diagnosis.** Rostrum shorter than pronotum, 1.6 times as long as wide in middle, widened in apical third. Forehead wider than rostrum base. Eyes rounded, convex, finely faceted. Antennae long, 11-segmented, inserted dorso-laterally near apical third of rostrum. Antennal club indistinct. Antennal scrobes foveiform. Transverse carina subbasal. Lateral carina reaches second third of pronotum. Pronotal declivity narrow. Tarsi not elongate. Tarsomeres 2 embracing tarsomere 3 laterally.

**Etymology.** The name is formed from the Latin “pseudo-” (false) and the generic name “Mecocerus”. Gender masculine.

**Comparison.** The new genus differs from the genus *Acanthothorax* Gaede, 1832 in the shorter antennae, not elongate tarsi, rostrum weaker widened at the apex, and narrower pronotal declivity.

**Remarks.** The tarsomere 2 embracing tarsomere 3 laterally, distinct transverse carina on the pronotum, and antennae inserted dorso-laterally indicate that the new genus belongs to Anthribidae. The new genus belongs to Mecocerini based on the antebasal transverse pronotal carina, foveiform dorso-lateral antennal scrobes and 11-segmented antennae.

*Pseudomecocerus alekseevi* sp. nov. (Figures 1a,b and 2i)

urn:lsid:zoobank.org:act:E0ACC250-C5FE-4349-9072-FEF9C79510EF

**Description.** Male. **Size.** Body length (without rostrum) 4.9 mm, rostrum length 0.7 mm. **Body** black, covered with short, light colored decumbent hairs. **Head** about equal to rostrum. Rostrum straight, 0.7 times as long as pronotum, 1.2 times as long as wide at apex, 1.6 times as long as wide in middle, 1.5 times as long as wide at base, densely punctate, flattened, widened in apical third. Forehead slightly wider than rostrum base, weakly convex, densely punctate. Eyes large, rounded, sharply convex, finely faceted. Temples 0.5 times as long as eye. Vertex slightly convex. Antennae long, inserted dorso-laterally near apical third of rostrum. Scape 1.3 times as long as wide. Antennomeres: 3–11—elongate; 3—2.5 times as long as wide; 4—2.9 times as long as wide, equal in length, and 0.9 times as narrow as antennomere 3; 5—3.1 times as long as wide, 1.1 times as long as and equal in width to antennomere 4; 6—2.7 times as long as wide, 0.7 times as long as and 0.9 times as narrow as antennomere 5; 7—3.3 times as long as wide, 1.3 times as long as and equal in width to antennomere 6; 8—2.7 times as long as wide, 0.8 times as long as and equal in width to antennomere 7; 9—3.0 times as long as wide, 1.5 times as long as and 1.3 times as wide as antennomere 8; 10—equal in length and width, 0.3 times as long as and equal in width to antennomere 9; 11—1.5 times as long as wide, 1.5 times as long as and equal in width to antennomere 10. Antennal club indistinct. **Pronotum** bell-shaped, 1.3 times as long as wide apically, 0.9 times as long as wide medially and basally. Disc coarsely punctate, slightly convex. Transverse carina subbasal. Lateral carina reaches second third of pronotum. Posterior angular carina complete. Pronotal declivity 0.3 times as long as pronotum. **Mesonotum.** Scutellum 0.9 times as long as wide. **Elytra** elongate, 2.2 times as long as wide at base, 1.9 times as long as wide in middle, 2.5 times as long as wide in apical quarter. Humeri weakly smoothed. Interstriae wide, 2.0–3.5 times as long as with of striae, slightly flattened, finely and intensely punctate. Prosternum punctate. **Legs.** Tibiae elongate, subparallel. Tarsi elongate. Tarsomere: 1—elongate, conical; 2—wide, conical, bilobed, covers base of tarsomere 3; 3—bilobed, narrower than tarsomere 2; 5—elongate.

**Material examined.** Holotype (KRAM), no. 6328.

**Etymology.** The epithet of this new species is dedicated to Vitalii I. Alekseev (Kaliningrad Regional Amber Museum) who contributed to the studies of the Baltic amber Coleoptera.

**Locality.** Baltic amber.

**Allandrini** Pierce, 1930

**Key to genera of Allandrini in Baltic amber**

1. Antennae equal or longer than body.....*Pseudomecorhis*
- Antennae reaching middle of pronotum.....*Allandroides*

Genus *Pseudomecorhis* Voss, 1953

Type species: *Pseudomecorhis simulator* Voss, 1953

**Key to species of genus *Pseudomecorhis* in Baltic amber**

1. Rostrum long and thin. Body (without rostrum) larger (10.0 mm). Temples shorter than eyes.....*P. simulator*
- Rostrum short and thick. Body (without rostrum) smaller (6.0 mm). Temples about 1.5 times as long as length of eye.....*P. orlovi*

*Pseudomecorhis orlovi* Zherikhin, 1971

Zherikhin [26]: 199, 202, 203, Figure 1 therein.

**Locality.** Baltic amber.

**Remarks.** The holotype should be deposited in PIN; however, it was not found there.

*Pseudomecorhis simulator* Voss, 1953 (Figure 1e)

Voss [24]: 122–123, Figure 1 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (GPIH).

Genus *Allandroides* Legalov, 2015

Type species: *Allandroides vossi* Legalov, 2015

*Allandroides vossi* Legalov, 2015 (Figure 1c)

Legalov [2]: 1452–1453, 1454, Figure 1b therein, plate 1, Figure 2 therein.

**Locality.** Baltic amber.

**Remarks.** The holotype of this species deposited in ISEA and specimen in MWOK no.7657/833.

[**Tropiderini** Lacordaire, 1865]

**Remarks.** The genus *Tropideres* Schoenherr, 1823 was recorded from Baltic amber [61].

**Zygaenodini** Lacordaire, 1865

Genus *Glaesotropis* Gratshev et Zherikhin, 1995

Type species: *Glaesotropis weitschati* Gratshev et Zherikhin, 1995

#### Key to subgenera of genus *Glaesotropis* in Eocene amber

1. Forehead narrower than longitudinal eye diameter.....*Pseudoglaesotropis*  
—Forehead wider than longitudinal eye diameter.....2
2. Antennomere 2 weakly narrower than antennomere 3. Antennomeres 1–3 subequal in length.....*Glaesotropis sensu stricto*  
—Antennomere 3 distinctly narrower and more or less shorter than antennomere 2.....*Electranthribus*

Subgenus *Pseudoglaesotropis* Legalov, 2012, **stat. nov.**

Type species: *Pseudoglaesotropis martynovi* Legalov, 2012

#### Key to species of subgenus *Pseudoglaesotropis* in Baltic amber

1. Elytral striae absent. Rostrum narrowed to eye. Antennomeres 3 and 4 elongate.....*G. balticus* **sp. nov.**  
—Elytral striae regular. Rostrum subparallel. Antennomeres 3 and 4 short.....*G. martynovi*

*Glaesotropis (Pseudoglaesotropis) balticus* **sp. nov.** (Figure 1d–f,i)

urn:lsid:zoobank.org:act:FFF9CEF9-C27E-49EF-BBF2-3EC6EEE5FD65

**Description.** Male. **Size.** Body length (without rostrum) 2.2 mm, rostrum length 0.5 mm. **Body** black, covered with sparse, light colored appressed hairs. **Head.** Rostrum short, almost straight, 0.3 times as long as pronotum, 1.2 times as long as wide at apex, equal in width in middle, 1.8 times as long as wide at base, densely punctate, flattened, widened in apical third. Forehead 0.7 times as long as wide at rostrum base, 0.9 times as narrow as longitudinal eye diameter, weakly flattened, densely punctate. Eyes large, rounded, convex, finely faceted. Temples very short. Vertex slightly convex. **Antennae** long, inserted laterally near middle of rostrum. Scape 2.0 times as long as wide. Antennomeres: 2–8—conical; 2—2.6 times as long as wide, 1.6 times as long as and 1.3 times as wide as scape; 3—3.4 times as long as wide, 0.9 times as long as and 0.7 times as narrow as antennomere 2; 4—2.3 times as long as wide, 0.7 times as long as and equal in width to antennomere 3; 5—1.8 times as long as wide, 0.9 times as long as and 1.1 times as wide as antennomere 4; 6—1.6 times as long as wide, equal in length and 1.1 times as wide as antennomere 5; 7—equal in length and width, 0.7 times as long as and 1.1 times as wide as antennomere 6; 8—equal in length and width, 1.2 times as long as and 1.2 times as wide as antennomere 7; antennal club loose, 0.5 times as long as antennomeres 2–8 combined; 9—equal in length and width, 1.7 times as long as and 1.7 times as wide as antennomere 8; 10—0.5 times as long as wide, 0.7 times as long as and 1.4 times as wide as

antennomere 9; 11—0.8 times as long as wide, 1.5 times as long as and 0.9 times as narrow as antennomere 10. **Pronotum** bell-shaped, coarsely punctate, slightly convex. Transverse carina subbasal. Lateral carina absent. Posterior angular carina complete. Pronotal declivity about 0.1 times as long as pronotum. **Mesonotum**. Scutellum small. **Elytra** quite wide, 1.7 times as long as pronotum. Humeri weakly smoothed. Elytral striae absent. Interstriae convex. **Thorax**. Prosternum coarsely punctate. Precoxal part of prosternum equal to procoxa length. Procoxal cavities rounded, separated. Postcoxal part of prosternum 0.5 times as long as procoxa length. Mesocoxal cavities rounded and separated. Metaventricle 1.3 times as long as length of mesocoxa, convex, densely punctate. Metepisternum 5.8 times as long as wide in middle. Metacoxal cavities dilated. **Abdomen** convex, weakly flattened in middle. Ventricle 1, 0.7 times as long as metacoxae. Ventricle 2 equal to ventricle 1. Ventricle 3, 0.7 times as long as ventricle 2. Ventricle 4, 0.8 times as long as ventricle 3. Ventricle 5 about 1.8 times as long as ventricle 4. Pygidium exposed. **Legs** elongate. Procoxae spherical. Femora clavate, without tooth. Profemora 2.5 times as long as wide in middle. Mesofemora 2.6 times as long as wide. Metafemora about 2.0 times as long as wide. Tibiae almost straight, weakly flattened, without mucro. Metatibia 5.2 times as long as wide in middle. Tarsi elongate, shorter than tibiae, with pulvilli on underside. Tarsomeres: 1—elongate, conical; 2—wide, conical, bilobed, covers base of tarsomere 3; 3—bilobed, narrower than second; 5—elongate. Claws large, diverging, free, with teeth. Metatarsomeres: 1—1.3 times as long as wide; 2—1.3 times as long as wide, 1.1 times as long as and 1.1 times as wide as tarsomere 1; 3—0.8 times as long as wide, 0.4 times as long as and 0.7 times as narrow as tarsomere 2; 5—2.7 times as long as wide, 2.7 times as long as and 0.8 times as narrow as tarsomere 3.

**Material examined.** Holotype (FEH), no. 656.

**Comparison.** The new genus differs from *G. (P.) martynovi* in the elytra lacking elytral striae, rostrum narrowed to eye and elongate antennomere 3 and 4.

**Etymology.** The epithet of this new species is formed from the name of the Baltic Sea, on the coast where the amber sample was collected.

**Locality.** Baltic amber.

*Glaesotropis (Pseudoglaesotropis) martynovi* (Legalov, 2012), **comb. nov.** (Figure 1g,h)

*Pseudoglaesotropis martynovi* Legalov, 2012

Legalov [39]: 263, 265, Figure 1a,b therein, pl. 8, Figure 1 therein.

**Locality.** Baltic amber.

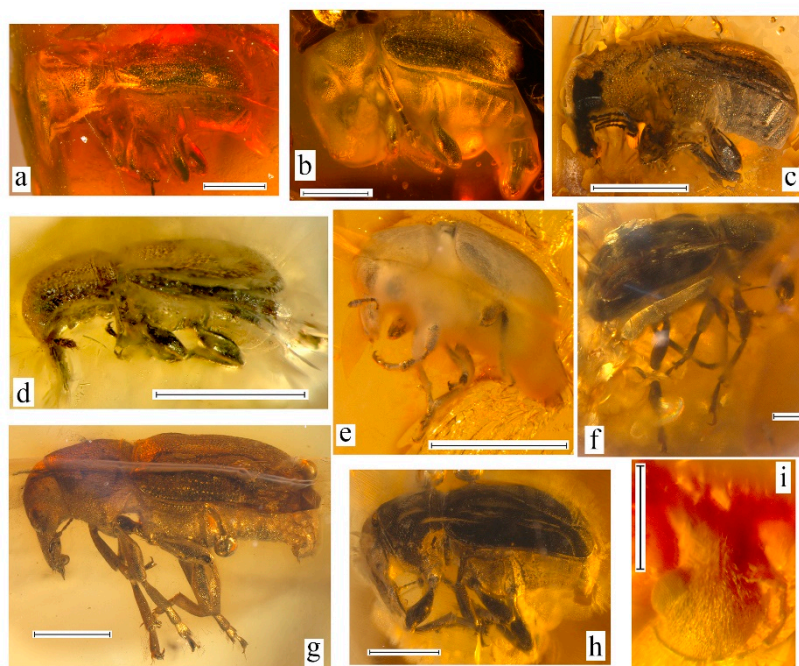
**Remarks.** This species is known only by the holotype (PIN).

Subgenus *Glaesotropis sensu stricto*

**Key to species of subgenus *Glaesotropis sensu stricto* in Eocene amber**

1. Rostrum parallel-sided.....*G. minor*  
—Rostrum narrowing in the basal one-third.....2
2. Antennomeres 1 and 2 shorter than antennomeres 3 and 4 combined. Dorsal side of rostrum located in plane of forehead.....*G. diadidasashai*  
—Antennomeres 1 and 2 longer than antennomeres 3 and 4 combined. Dorsal side of rostrum separated by depression from forehead.....3
3. Body 4.9–5.1 mm long. External elytral edge strongly concave at metacoxa. Forehead convex.....*G. weitschati*  
—Body 2.6–3.8 mm long. External elytral edge slightly concave at metacoxa. Forehead flat.....4
4. Relatively large (3.8 mm long). Body elongate. Forehead slightly convex.....*G. gusakovi*  
—Relatively small (2.6–3.3 mm long). Body relatively wide. Forehead flat.....*G. succiniferus*





**Figure 2.** Habitus of Anthribinae from Baltic amber. (a) *Glaesotropis minor*, holotype, PIN, no. 964/801: body, laterally. (b) *G. minor*, paratype, PIN, no. 363/109, body, laterally. (c) *G. alleni*, holotype, ISEA, no. BA2012/19, body, laterally. (d) *G. gratshevi*, holotype, ISEA, no. BA2014/2, body, laterally. (e) *G. zherikhini*, holotype, ISEA, no. BA2011/2, body, laterally. (f) *G. weitschati*, specimen, CVGM, no. 027C10, body, laterally. (g) *G. gusakovi*, holotype, CVGM, no. 026C12, body, laterally. (h) *G. succiniferus*, holotype, CVGM, no. 028C13, body, laterally. (i) *Pseudomecocerus alekseevi* gen. et sp. nov., holotype, KRAM, no. 6328, rostrum and head, dorsally. Scale bars: 1.0 mm. See Section 2 for names of collections.

*Glaesotropis (Glaesotropis) diadiasashai* Gratshev et Perkovsky, 2008  
Gratshev, Perkovsky [64]: 60–61, Figure 1 therein.

**Locality.** Rovno amber.

**Remarks.** This species is known only by the holotype (SIZK).

*Glaesotropis (Glaesotropis) gusakovi* Legalov, 2015 (Figure 2g)  
Legalov [2]: 1455–1456, Figure 1c therein, plate 1, Figure 3 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (CVGM) and the specimen (MWOK) no. 7657/95.

*Glaesotropis (Glaesotropis) minor* Gratshev et Zherikhin, 1995 (Figure 2a,b)  
Gratshev, Zherikhin [33]: 153, 155, Figures 6–10 therein, pl. I, Figure 2 therein.

**Locality.** Baltic amber.

**Remarks.** Holotype is deposited in the PIN.

*Glaesotropis (Glaesotropis) succiniferus* Legalov, 2015 (Figure 2h)  
Legalov [2]: 1455, 1456–1457, Figure 1c therein, plate 1, Figure 4 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (CVGM) and paratype (ISEA).

*Glaesotropis (Glaesotropis) weitschati* Gratshev et Zherikhin, 1995 (Figure 2f)  
Gratshev, Zherikhin [33]: 151, 153, Figures 1–5 therein, pl. I, Figure 1 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (**GPIH**) and specimens (**CVGM**) no. 027C10, (MWOK) nos. 57/153 and 1155/218.

Subgenus *Electranthribus* Legalov, 2013

Type species: *Electranthribus zherikhini* Legalov, 2013

**Key to species of subgenus *Electranthribus* in Baltic amber**

1. Precoxal part of prosternum strongly elongate, 8.1 times as long as procoxa. Pronotal declivity relatively long. Relatively small (1.9 mm long).....*G. gratshevi*  
 —Precoxal part of prosternum only slightly elongate, subequal in length to procoxa. Pronotal declivity relatively short. Relatively large (2.2–2.8 mm long).....2
2. Posterior angular carinula incomplete. Antennomere 2 2.0 times as long as antennomere 3.....*G. alleni*  
 —Posterior angular carinula complete. Antennomere 2 1.5 times as long as antennomere 3.....*G. zherikhini*

*Glaesotropis (Electranthribus) alleni* Legalov, 2015 (Figure 2c)

Legalov [2]: 1457, 1457–1458, Figure 1e therein, plate 1, Figure 5 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (**ISEA**).

*Glaesotropis (Electranthribus) gratshevi* Legalov, 2015 (Figure 2d)

Legalov [2]: 1457, 1458, Figure 1f therein, plate 2, Figure 2 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (**ISEA**).

*Glaesotropis (Electranthribus) zherikhini* (Legalov, 2013) (Figure 2e)

Legalov [41]: 61, Figures 1–4 therein (*Electranthribus*).

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (**ISEA**).

**Choraginae** W. Kirby, 1819

**Valenfriesiini** Alonso-Zarazaga et Lyal, 1999

Genus *Eduardoxenus* Legalov, Nazarenko et Perkovsky, 2018

Type species: *Eduardoxenus unicus* Legalov, Nazarenko et Perkovsky, 2018

*Eduardoxenus unicus* Legalov, Nazarenko et Perkovsky, 2018

Legalov et al. [70]: 209–210, Figures 1–4 therein.

**Locality.** Rovno amber.

**Remarks.** This species is known only by the holotype (**SIZK**).

**Belidae** Schoenherr, 1826

**Oxycoryninae** Schoenherr, 1840

**Key to tribes of Oxycoryninae in Baltic amber**

1. Head behind eyes without constriction. Pronotum without carinae on disc. Rostrum in males without ventral long setae.....*Oxycraspedini*  
 —Head behind eyes with more or less distinct constriction. Pronotum with serrated lateral carinae and three carinae on disc. Rostrum in males ventrally often with long setae.....*Metrioxenini*

**Oxycraspedini** Marvaldi et Oberprieler, 2006

Genus *Oxycraspedus* Kuschel, 1955.

Type species: *Oxycraspedus poinari* Legalov, 2016.

*Oxycraspedus poinari* Legalov, 2016 (Figure 3a)

Legalov [44]: 58–60, Figure 1 therein.

**Locality.** Baltic amber.

**Remarks.** The holotype of this species deposited in ISEA.

**Metrioxenini** Voss, 1953

**Key to subtribes of Metrioxenini in Baltic amber**

1. Ventricle 1 little longer than ventrite 2. Body large (2.2–2.6 mm in length).....Zherichinixenina
- Ventricle 1 strongly elongate. Body small (3.5–4.3 mm in length).....Metrioxenina

**Metrioxenina** Voss, 1953

Genus *Archimetroxena* Voss, 1953

Type species: *Archimetroxena electrica* Voss, 1953

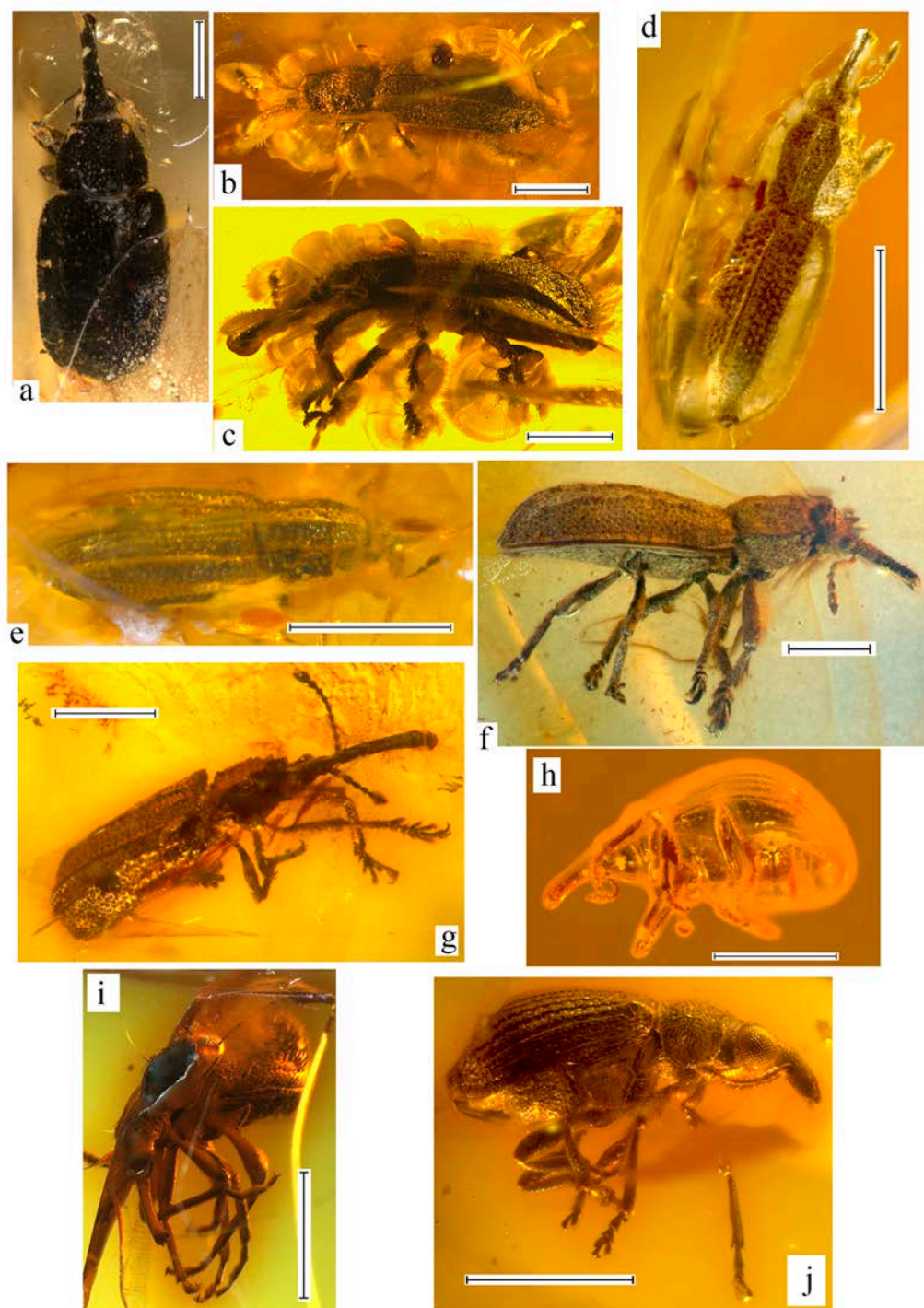
= *Palaeometrioxena* Legalov, 2012, **syn. nov.**

Type species: *Palaeometrioxena zherikhini* Legalov, 2012

**Remarks.** The study of the holotype of *Archimetroxena electrica* showed that this species also has blunt teeth along the edges of the pronotum.

**Key to species of genus *Archimetroxena* in Baltic amber**

1. Forehead with small horn-like tubercles on either side of eyes. Pronotum densely punctate, almost matte..... *A. electrica*
- Forehead simple. Pronotum sparsely punctate, lustrous..... *A. zherikhini*



**Figure 3.** Habitus of Belidae and Rhynchitidae from Baltic amber. (a) *Oxycraspedus poinari*, holotype, ISEA, no. BA2011/1, body, dorsally. (b,c) *Archimetroxena electrica*, holotype, GPIH, no. 194: body, dorso-laterally (b); body, laterally (c). (d) *A. electrica*, specimen, ISEA, no. 2012/18, body, dorsally. (e) *A. zherikhini*, holotype, PIN. no. 964/1236, body, dorsally. (f) *Succinometrixena poinari*, holotype, ISEA, no. BA2015/2, body, laterally. (g) *S. bachofeni*, holotype, ISEA, no. BA2012/6, body, dorsally. (h) *Baltoconapium anderseni*, holotype, ZMUC, no. 959, body, ventrally. (i) *Baltocar succinicus*, holotype, GPIH, no. 195, body, laterally, in front. (j) *Palaeotanaos oisensis*, specimen, MNHN, no. PA533, body, laterally. Scale bars: 1.0 mm. See Section 2 for names of collections.

***Archimetroxena electrica* Voss, 1953 (Figure 3b,d)**

Voss [24]: 124–125, Figures 2 and 3 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (GPIH) and specimen (ISEA no. 2012/18).

***Archimetroxena zherikhini* (Legalov, 2012), **comb. nov.** (Figure 3e)**

*Palaeometroxena zherikhini* Legalov, 2012

Legalov [39]: 268, 270, Figures 2a,b therein, pl. 9, Figure 1 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (PIN) and specimen (incl. GPIH, no. AKBS00111a-Curculionidae).

***Zherichinixenina* Legalov, 2009**

Genus *Succinometroxena* Legalov, 2012

Type species: *Succinometroxena poinari* Legalov, 2012

**Key to species of genus *Succinometroxena* in Baltic amber**

1. Forehead with horn-like tubercles on either side of eyes.....*S. poinari*  
— Forehead without horn-like tubercles on either side of eyes.....2
2. Body (without rostrum) smaller (3.5 mm). Elytra wider, with small punctation.....*S. bachofeni*  
— Body (without rostrum) larger (6.3 mm). Elytra narrower, with large punctation.....*S. attenuata*

*Succinometroxena attenuata* Legalov et Poinar, in lit.

Legalov, Poinar [53], in litteris.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (PACO).

*Succinometroxena bachofeni* Legalov, 2013 (Figure 3g)

Legalov [41]: 62–63, Figures 5–8 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

*Succinometroxena poinari* Legalov, 2012 (Figure 3f)

Legalov [38]: 215–216, Figures 1–5 therein.

**Locality.** Baltic amber.

**Remarks.** Holotype is kept in ISEA.

**Rhynchitidae Gistel, 1848****Key to subfamilies of Rhynchitidae in Eocene amber**

1. Tarsal claws strongly divergent, lacking teeth.....Sayrevilleinae  
— Tarsal claws slightly divergent, usually with teeth.....Rhynchitinae

**Sayrevilleinae** Legalov, 2003

**Sanyrevilleini** Legalov, 2003

Genus *Baltocar* Kuschel, 1992

Type species: *Car succinicus* Voss, 1953

**Remarks.** The key to species is based on the key from Riedel et al. [36].

**Key to species of genus *Baltocar* in Baltic amber**

1. Elytral striae irregular. Rostrum shorter or subequal to pronotum.....2  
— Elytral striae regular. Rostrum longer or subequal to pronotum.....3
2. Body covered with dense setae. Rostrum slightly curved, subequal to pronotum.....*B. convexus*

—Body without distinct pubescence. Rostrum distinctly curved, shorter than pronotum.....	<i>B. subnudus</i>
3. Pronotal disc coarsely punctate. Setae widened.....	<i>B. succinicus</i>
—Pronotal disc transversely irregularly rugose. Setae thin.....	4
4. Pronotum 1.4 times as long as wide, with subparallel sides.....	<i>B. groehni</i>
—Pronotum 1.2 times as long as wide, with weak rounded from base to apex sides.....	<i>B. hofeinsorum</i>

***Baltocar convexus*** Legalov, 2015 (Figure 4b)

Legalov [2]: 1499, 1501, Figure 5d therein, plate 7, Figure 1 therein.

**Locality.** Baltic amber.

**Remarks.** The holotype of this species deposited in ISEA.

***Baltocar groehni*** Riedel, 2012

Riedel et al. [36]: 780–782, Figures 16–22 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (GPIHG).

***Baltocar hofeinsorum*** Riedel, 2012 (Figure 4a)

Riedel et al. [36]: 782, 785–786, Figures 23–48, 65, and 66 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (HCH) and three paratypes (GPIHG, SMNK) [36] and a specimen (ISEA) [2].

***Baltocar subnudus*** Riedel, 2012

Riedel et al. [36]: 786, 789, Figures 49–58 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (SDEI) and the paratype (GPIHG) [36].

***Baltocar succinicus*** (Voss, 1953) (Figure 3i)

Voss [24]: 125–126, Figure 4 therein (*Car*).

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (GPIH).

**Rhynchitinae** Gistel, 1848

**Rhynchititae** Gistel, 1848





**Figure 4.** Habitus of Rhynchitidae and Brentidae from Baltic amber. (a) *Baltocar hoffeinsorum*, specimen, ISEA, no. 2012/14, body, laterally. (b) *B. convexus*, holotype, ISEA, no. BA2013/3, body, laterally. (c) *Electrauletes unicus*, holotype, ISEA, no. BA2014/1, body, laterally. (d) *Succinorhynchites alberti*, holotype, ISEA, no. BA2012/7, body, laterally. (e) *Eocenorhynchites vossi*, holotype, PIN. no. 964/1233, body, laterally. (f) *Baltocyba electrinus*, holotype, ISEA, no. BA2017/9, body, laterally. (g,h) *Archinvolvulus liquidus*, holotype, ZMUC, no. 957: fore-body, laterally (g); body, dorsally (h). (i) *Baltoapion subdiscedens*, holotype, GPIH, no. 196, body, laterally; (j) *B. gusakovi*, holotype, CVGM, no. 023C96, body, laterally. Scale bars: 1.0 mm. See Section 2 for names of collections.

#### Key to tribes of Rhynchitidae in Eocene amber

1. Rounded apex of elytra when wings closed. Elytral striae indistinct or absent....Auletini
- Apices of elytra separately rounded. Elytral striae regular.....Rhynchitini

#### Auletini Desbrochers des Loges, 1908

##### Key to subtribes of Auletini in Eocene amber

1. Tarsal claws lacking teeth..... Auletina
- Tarsal claws with teeth.....2
2. Tibia lacking costate dorsal margin..... Pseudomesauletina
- Tibia with costate dorsal margin..... Pseudauletina

#### Auletina Desbrochers des Loges, 1908

Genus *Electrauletes* Legalov, 2015

Type species: *Electrauletes unicus* Legalov, 2015

*Electrauletes unicus* Legalov, 2015 (Figure 4c)

Legalov [2]: 1501–1502, Figure 5e therein, plate 7, Figure 3 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

**Pseudauletina** Voss, 1933Genus *Eoropseudauletes* Kania et Legalov, 2019Type species: *Eoropseudauletes plucinskii* Kania et Legalov, 2019*Eoropseudauletes plucinskii* Kania et Legalov, 2019

Kania, Legalov [52]: 59, 61, Figures 1 and 2, pl. 6 therein.

**Locality.** Baltic amber.**Remarks.** This species is known only by the holotype (GMPB).**Pseudomesauletina** Legalov, 2003Genus *Pseudomesauletes* Legalov, 2001Type species: *Auletes uniformis* Roelofs, 1874Subgenus *Pseudomesauletes sensu stricto**Pseudomesauletes (Pseudomesauletes) groehni* Bukejs et Legalov, 2019

Bukejs, Legalov [73], 169–170, Figure 1 therein.

**Locality.** Rovno amber.**Remarks.** This species is known only by the holotype (GPIHG).**Rhynchitini** Gistel, 1848**Key to subtribes of Rhynchitini in Baltic amber**

1. Elytra lacking scutellar striae.....[Rhynchitina]
- Elytra with scutellar striae.....2
2. Ventrite 1 narrower than ventrite 2. Ventrite 3 slightly narrower than ventrite 2.....Temnocerina
- Ventrites 1 and 2 almost equal in width. Ventrite 3 much narrower than ventrite 2.....Perrhynchitina

**Temnocerina** Legalov, 2003Genus *Eocenorhynchites* Legalov, 2012Type species: *Eocenorhynchites vossi* Legalov, 2012*Eocenorhynchites vossi* Legalov, 2012 (Figure 4e)

Legalov [39]: 266–267, Figure 1c,d therein, pl. 8, Figure 2 therein.

**Locality.** Baltic amber.**Remarks.** This species is known only by the holotype (PIN).**Perrhynchitina** Legalov, 2003Genus *Succinorhynchites* Legalov, 2013Type species: *Succinorhynchites alberti* Legalov, 2013*Succinorhynchites alberti* Legalov, 2013 (Figure 4d)

Legalov [41]: 68–70, Figures 17 and 18 therein.

**Locality.** Baltic amber.**Remarks.** This species is known only by the holotype (ISEA).**[Rhynchitina** Gistel, 1848]**Remarks.** The genus *Rhynchites* Schneider, 1791 was recorded from Baltic amber [57,61].**[Attelabidae** Billberg, 1820]**Remarks.** A tube rolled by a representative of this family was discovered in Baltic amber.**Brentidae** Billberg, 1820**Key to subfamilies of Brentidae in Eocene amber**



1. Antennae straight. Antennal scrobes deep. Scutellum visible. Base of elytra lacking crenulate carina.....Apioninae
  - Antennae geniculate. Antennal scrobes shallow. Scutellum concealed. Base of elytra with crenulate carina.....Nanophyinae

#### Apioninae Schoenherr, 1823

##### Key to supertribes of Apioninae in Eocene amber

1. Elytral stria 10 distinct, merges with stria 9 near metacoxa..... Rhadinocybitae
  - Elytral stria 10 absent.....2
2. Procoxal cavities contiguous. Trochanters short.....Palaeotanaitae
  - Procoxal cavities separated. Trochanters long.....3
3. Pronotal vestiture centrifugal, in which hairs directed away from pronotal midline basally, more or less parallel to midline on sides and perpendicular to apical edge apically..... Aspidapiitae
  - Pronotal vestiture centripetal, in which hairs directed to pronotal midline..... Apionitae

#### Rhadinocybitae Alonso-Zarazaga, 1992

##### Key to tribes of Rhadinocybitae in Baltic amber

1. Antennomere 1 almost as long as antennomeres 2 and 3 combined. Greatest width of pronotum near middle. Elytral striae with sharp edges.....Notapionini
  - Antennomere 1 being slightly larger than antennomeres 2–5 combined. Greatest width of pronotum in apical third. Elytral striae lacking sharp edges.....Rhadinocybini

#### Rhadinocybini Alonso-Zarazaga, 1992

Genus *Baltocyba* Legalov, 2018

Type species: *Baltocyba electrinus* Legalov, 2018

*Baltocyba electrinus* Legalov, 2018 (Figure 4f)

Legalov [46]: 162–164, Figure 1 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

#### Notapionini Zimmerman, 1994

Genus *Archinvolvulus* Voss, 1972

Type species: *Involvulus liquidus* Voss, 1972

*Archinvolvulus liquidus* (Voss, 1972) (Figure 4g,h)

Voss [25]: 170–171, Figure 2 therein (*Involvulus*).

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ZMUC).

#### Palaeotanaitae Legalov, Kirejtshuk et Nel, 2019

##### Palaeotanaini Legalov, Kirejtshuk et Nel, 2019

Genus *Palaeotanaos* Kirejtshuk, Legalov et Nel, 2015

Type species: *Palaeotanaos oisensis* Kirejtshuk, Legalov et Nel, 2015

*Palaeotanaos oisensis* Kirejtshuk, Legalov et Nel, 2015 (Figure 3j)

Kirejtshuk et al. [19]: 1437, 1439, 1440, Figures 1 and 2 therein.

**Locality.** Oise amber.

**Remarks.** This is a common species in Oise amber [20].

#### Aspidapiitae Alonso-Zarazaga, 1990

**Key to tribes of Aspidapiitae in Baltic amber**

1. Scutellum protrudes above elytra, distinctly elongate.....Aspidapiiini
- Scutellum flat, weakly elongate, or quite wide.....Kalcapiiini

**Aspidapiiini** Alonso-Zarazaga, 1990**Key to genera of Aspidapiiini in Baltic amber**

1. Scutellum acuminate at apex. Body robust..... *Pseudaspidapion*
- Scutellum obtuse at apex. Body slender..... *Baltoapion*

Genus *Pseudaspidapion* Wanat, 1990Type species: *Apion spadiceum* Wagner, 1908*Pseudaspidapion khnzoriani* (Zherikhin, 1971)Zherikhin [26]: 199, 204, Figure 2 therein, pl. X, Figure 1 therein (*Apion*).**Locality.** Baltic amber.**Remarks.** The holotype should be deposited in PIN; however, it was not found there.Genus *Baltoapion* **gen. nov.**

urn:lsid:zoobank.org:act:C6505E9D-720B-44A2-9712-4214

Type species: *Melanapion gusakovi* Legalov, 2015

**Diagnosis.** Body length (without rostrum) 1.8–3.1 mm. Body black, slightly elongate, dorsally convex, covered with light, short hairs. Head slightly elongate. Rostrum long, slightly curved, cylindrical. Antennal scrobes weak, directed to under rostrum. Forehead flattened, wider than rostrum base. Eyes large, round, sharply convex. Temples long or short. Antennae inserted ventrally in middle or in basal one-third of rostrum. Scape elongate. Club compact, with distinct sutures between its antennomeres. Pronotum almost campaniform, roughly punctate. Scutellum slightly elongate, distinctly projecting above elytra, obtuse at apex. Elytra elongate, distinctly convex. Striae distinct and deep. Interstriae more or less wide, slightly convex, weakly finely transversely wrinkled or finely punctate. Procoxal cavities contiguous. Mesocoxal cavities separate.

**Etymology.** The name is formed from the Latin “*balticum*” (Baltic) and part of the generic name “*Apion*”. Gender neuter.

**Comparison.** The new genus differs from the *Pseudaspidapion* Wanat, 1990 in the scutellum obtuse at apex and more slender body.

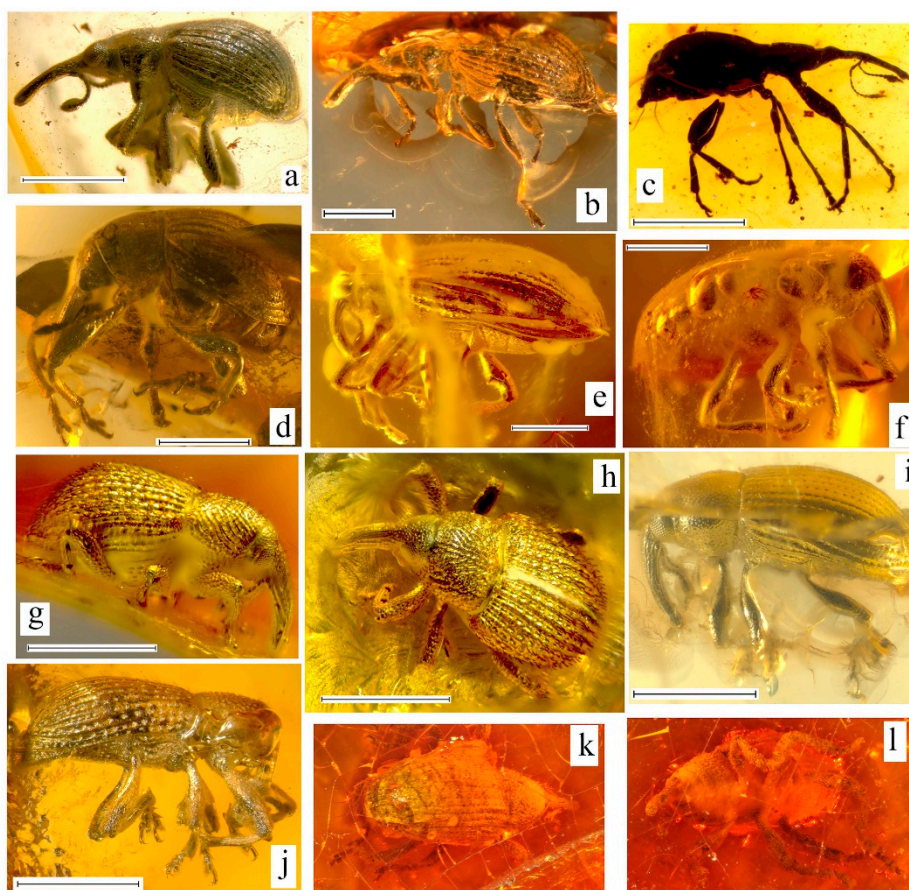
**Key to species of genus *Baltoapion* in Baltic amber**

1. Rostrum long and thin. Antennae inserted in middle of rostrum. Temples short. Elytral interstriae finely transversely wrinkled. Body (without rostrum) smaller (1.8 mm)..... *B. gusakovi*
- Rostrum short and thick. Antennae inserted in basal one-third of rostrum. Temples long. Elytral interstriae finely punctate. Body (without rostrum) larger (3.1 mm)..... *B. subdiscedens*

*Baltoapion gusakovi* (Legalov, 2015), **comb. nov.** (Figure 4j)*Melanapion gusakovi* Legalov, 2015

Legalov [2]: 1477, 1479–1481, Figure 5a therein, plate 6, Figure 4 therein.

**Locality.** Baltic amber.**Remarks.** This species is known only by the holotype (CVGM).



**Figure 5.** Habitus of Brentidae and Curculionidae from Baltic amber. (a) *Melanapion poinari*, holotype, ISEA, no. BA2013/22, body, laterally. (b) *M. wanati*, holotype, ISEA, no. BA2012/5, body, laterally. (c) *Conapium alleni*, holotype, ISEA, no. BA2012/2, body, laterally. (d) *Baltonanophyes crassirostre*, holotype, ISEA, no. BA2017/10, body, laterally. (e,f) *Dorytomus korotyaevi* sp. nov., holotype, ISEA, no. BA2015/6: body, laterally, left (e); body, laterally, right (f). (g,h) *D. bukejsi*, holotype, ISEA, no. BA2019/3: body, laterally (g); body, dorsally (h). (i) *D. electrinus*, holotype, ISEA, no. BA2015/5, body, laterally. (j) *D. nudus*, holotype, ISEA, no. BA2013/5, body, laterally. (k,l) *Electrotribus theryi*, holotype, CCMCL, no. A6487: body, laterally (k); body, dorsally (l). Scale bars: 1.0 mm (a–j). See Section 2 for names of collections.

***Baltoapion subdiscedens*** (Voss, 1953), **comb. nov.** (Figure 4i)

*Apion subdiscedens* Voss, 1953

Voss [24]: 126–127, Figure 5 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (GPIH).

**Kalcapiini** Alonso-Zarazaga, 1990

**Key to genera of Kalcapiini in Baltic amber**

1. Femora ventrally with spine at distal 1/3. Claws simple..... *Succinapion*  
 –Femora without spine. Claws with teeth..... *Melanapion*

Genus *Melanapion* Wagner, 1930

Type species: *Apion minimum* Herbst, 1797

Subgenus *Melanapionoides* Legalov, 2012

Type species: *Melanapion poinari* Legalov, 2015

**Key to species of subgenus *Melanapionoides* in Baltic amber**

1. Eyes sharply convex. Striae of elytra relatively wide. Body relatively large, 2.4 mm long.....*M. (M.) poinari*  
 —Eyes slightly convex. Striae of elytra relatively narrow. Body relatively small, 1.7–2.0 mm long.....*M. (M.) wanati*

***Melanapion (Melanapionoides) poinari*** Legalov, 2015 (Figure 5a)

Legalov [2]: 1477–1479, Figure 4e therein, plate 6, Figure 3 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

***Melanapion (Melanapionoides) wanati*** Legalov, 2012 (Figure 5b)

Legalov [40]: 220, Figure 1 therein, pl. 2, Figures 3 and 4 therein.

**Locality.** Baltic amber.

**Remarks.** The holotype of this species deposited in ISEA.

Genus ***Succinapion*** Legalov et Bukejs, 2014

Type species: *Succinapion telnovi* Legalov et Bukejs, 2014

***Succinapion telnovi*** Legalov et Bukejs, 2014

Legalov, Bukejs [42]: 604–606, Figures 1–3 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ABCD).

**Apionitae** Schoenherr, 1823

**Piezotrachelini** Voss, 1959

**Key to genera of Piezotrachelini in Baltic amber**

1. Mesocoxal cavities separated. Pronotum subcylindrical..... *Conapium*  
 —Mesocoxal cavities contiguous. Pronotum almost campaniform..... *Baltoconapium*

Genus ***Conapium*** Motschulsky, 1866

Type species: *Apion gracile* Gerstaecker, 1854

Subgenus ***Palaeoconapion*** Legalov, 2012

Type species: *Conapium alleni* Legalov, 2012

***Conapium (Palaeoconapion) alleni*** Legalov, 2012 (Figure 5c)

Legalov [40]: 221–222, Figure 4 therein, pl. 2, Figures 7 and 8 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

Genus ***Baltoconapium* gen. nov.**

urn:lsid:zoobank.org:act:467EEACE-C4D9-4EFE-BBBF-A16B4B8A1702

Type species: *Apion anderseni* Voss, 1972

**Diagnosis.** Body length (without rostrum) 2.0 mm. Body black, naked, lustrous. Head not constricted behind eyes. Antennae and legs brown. Rostrum weakly curved, slightly longer than pronotum. Antennal scrobes weak. Eyes large, rounded. Antennae inserted before middle. Club compact, with distinct sutures between its antennomeres. Pronotum almost campaniform, finely punctate. Elytra almost pear-shaped, stark convex, with weakly humeri. Elytral striae weak with fine points. Interstriae wide, flat, without punctures. Stria 10 absent. Prosternum not emarginate. Pro- and mesocoxal cavities contiguous. Trochanters long. Claws with teeth.

**Etymology.** The name is formed from the Latin “*Baltic*” (Baltic) and part of the generic name “*Conapium*”. Gender neuter.

**Comparison.** The new genus differs from the *Conapium* in the contiguous mesocoxal cavities. and almost campaniform pronotum. From the genus *Piezotrachelus* Schoenherr, 1839 with contiguous mesocoxal cavities it differs in the not emarginate prosternum and head not constricted behind eyes.

*Baltoconapium anderseni* (Voss, 1972), **comb. nov.** (Figure 3h)

*Apion anderseni* Voss, 1972

Voss [25]: 171–173, Figures 3 and 11 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ZMUC).

Genus *Electrapion* Wagner, 1924

Type species: *Apion kuntzeni* Wagner, 1924

*Electrapion kuntzeni* (Wagner, 1924)

Wagner [27]: 134–136 (*Apion*).

**Locality.** Baltic amber.

**Remarks.** The genus is conditionally placed in this tribe because of the almost naked body, large size, flat scutellum, long rostrum, and elytra with nine striae. The holotype of this species is absent in ZMHB [62]. New finds of this species are needed to clarify the systematic position.

**Nanophyinae** Gistel, 1856

**Nanophyini** Gistel, 1856

**Remarks.** The genus *Nanophyes* Schoenherr, 1838 was recorded from Baltic amber [61].

Genus *Baltonanophyes* Legalov, 2018

Type species: *Baltonanophyes crassirostre* Legalov, 2018

*Baltonanophyes crassirostre* Legalov, 2018 (Figure 5d)

Legalov [46]: 165–166, Figure 2 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

**Curculionidae** Latreille, 1802

**Key to subfamilies of Curculionidae in Eocene amber**

1. Protibia distally with groove and row of dense erect setae.....Cossoninae  
—Protibia distally without mouth groove and row of dense erect setae.....2
2. Tarsomere 5 with claws widely separated by dermal lobes. Antennae inserted at base or near middle of rostrum.....Dryophthorinae  
—Tarsomere 5 with claws not separated by dermal lobes. Antennae inserted near middle or at rostrum apex.....3
3. Mesepimeron enlarged and visible between bases of prosternum and elytra; if not then eyes large and subcontiguous dorsally on forehead and the maximum width of elytra usually at base.....Conoderinae  
—Mesepimeron not enlarged and invisible between bases of prosternum and elytra.....4
4. Tibiae without uncus and groups of setae, sometimes with mucro. Mandibles usually massive, with scar of deciduous process.....Entiminae  
—Tibiae with uncus and two groups of setae, usually with mucro; if uncus absent, rostrum very long. Mandibles without scar.....5
5. Body often with dense varnish-like coating of scales. Uncus displaced onto inner apical angle. Tibiae often with apical spurs. Ventricle 5 usually with anal setae.....Erihrhininae  
—Body without dense varnish-like coating of scales. Uncus (if present) located at outer apical angle or displaced onto inner apical angle. Tibiae without apical spurs.....6

6. Ventricle 5 always without anal setae. Uncus absent (at least on protibiae) or not large, displaced onto inner apical angle. Mucro usually absent. Antennal scrobes usually invisible from above. Posterior angles of ventrite 2 sometimes extended strongly posteriorly toward ventrite 3.....Curculioninae
- Ventricle 5 often with anal setae. Uncus large, located at outer apical angle or, rarely, displaced onto inner apical angle. Antennal scrobes usually visible from above. Posterior margins of ventrites 2 and 3 straight.....7
7. Body oval or wide. Prementum without transverse groove, small. Claws free.....Molytinae
- Body elongate. Prementum with transverse grooves, large. Claws usually fused at base.....[Lixinae]

### **Eirrhininae** Schoenherr, 1825

#### **Key to tribes of Eirrhininae in Eocene amber**

1. Body covered by dense varnish-like coating over scales. Antennal scrobes in anterior part seen from above. Prosternum with ventral channel.....[Bagoini]
- Body naked or covered simple scales. Antennal scrobes in anterior part not seen from or visible only in place on antennal attachment. Prosternum simple.....2
2. Eyes rounded. Elytral stria 9 short, fused with stria 10 at level of metacoxa. Femora with tooth.....Dorytomini
- Eyes transverse, oval, if rounded than ventrite 5 without anal setae. Elytral stria 9 long, not fused with stria 10 at level of metacoxal. Femora lacking tooth.....[Eirrhinini]

[**Eirrhinini** Schoenherr, 1825]

**Remarks.** The genus *Notaris* Germar, 1817 was recorded from Baltic amber [61].

### **Dorytomini** Bedel, 1886

Genus *Dorytomus* Germar, 1817

Type species: *Curculio vorax* Fabricius, 1792 (= *Curculio longimanus* Forster, 1771)

#### **Key to species of genus Dorytomus in Eocene amber**

1. Elytral interstriae with decumbent setae or scales.....2
- Elytral interstriae without decumbent setae or scales.....4
2. Elytral interstriae with decumbent setae, smooth..... *D. nudus*
- Elytral interstriae with decumbent scales, punctate..... 3
3. Rostrum long. Body wide. Elytral interstriae slightly convex, distinctly wider than elytral striae. Pronotum finely punctate..... *D. groehni*
- Rostrum short. Body narrower. Elytral interstriae flat, equal or slightly wider than elytral striae. Pronotum coarsely punctate..... *D. bukejsi* **sp. nov.**
4. Body not lustrous, weaker convex. Pronotum and thorax densely punctate. Elytral interstriae wrinkly, punctate..... *D. vlaskini*
- Body lustrous, more convex. Pronotum and thorax sparsely punctate. Elytral interstriae finely punctate..... 5
5. Scape not reaching eye. Eyes coarsely faceted, with seven facets longitudinal to long axis.....*D. electrinus*
- Scape reaching eye. Eyes finely faceted, with more than 15 facets longitudinal to long axis..... *D. korotyaevi* **sp. nov.**

### **Dorytomus bukejsi** **sp. nov.** (Figure 5g,h)

urn:lsid:zoobank.org:act:7F6B37D3-9A6E-4E99-AB13-E90E8ED00697

**Description.** Male. **Size.** Body length (without rostrum) 2.5 mm; rostrum length 0.5 mm. **Body** black, covered with decumbent narrow scales. **Head** 0.3 times as long as rostrum. Rostrum long, subcylindrical, 5.5 times as long as wide at apex, 4.0 times as long as wide in middle and 3.6 times as long as wide at base, 1.2 times as long as pronotum, distinctly curved, densely punctate. Antennal

scrobes distinct, directed to eye. Forehead 0.8 times as long as rostrum base width, flattened, punctate. Eyes large, 0.6 times as long as wide, not protruding from margin of head. Temples 0.7 times as long as eye length. **Antennae** inserted in apical third, geniculate. Scape 7.3 times as long as width, not reaching eye. Funicle seven-segmented. Club compact. **Pronotum** bell-shaped, 1.1 times as long as wide basally, 0.8 times as long as wide in middle and basally. Disc weakly convex, coarsely rugose, punctate. **Elytra** distinctly convex, weakly elongate, 2.9 times as long as pronotum, 1.7 times as long as wide at base, 1.5 times as long as wide in middle, 1.9 times as long as wide in apical quarter. Greatest width in middle. Humeri distinct. Striae regular, distinct and deep, with sparse deep points. Elytral interstriae weakly convex, narrow, subequal in stria width, with row of scales. Stria 9 merges with stria 10 at level of metacoxae. **Thorax**. Prosternum densely punctate, without postocular lobes. Metaventricle subequal to metacoxa length, weakly convex, punctate. Metepisternum narrow. **Abdomen** convex. Ventrites 1 and 2 quite elongate. Ventrites 3 and 4 short, equal in length. Ventricle 1 subequal to metacoxal length. Ventricle 2 1.3 times as long as ventrite 1. Ventricle 3 0.5 times as long as ventrite 2. Ventricle 5 1.7 times as long as ventrite 4, with anal setae. **Legs** elongate. Femora weakly clavate, with teeth. Metafemora length/width ratio 3.3. Tibiae almost straight, flattened, with small uncus displaced by inner apical angle and two apical bunches of setae. Tarsi elongate, latter with pulvilli on underside. Tarsomeres: 1 and 2—conical; 3—bilobed; 5—elongate, with large free claws with teeth. Metatarsomeres: 1—1.2 times as long as wide; 2—equal in length and width, 0.9 times as long as and equal in width to tarsomere 1; 3—equal in length and width, 1.3 times as long as and 1.3 times as wide as tarsomere 2; 5—6.5 times as long as wide, 1.6 times as long as and 0.3 times as narrow as tarsomere 3.

**Material examined.** Holotype (ISEA), no. BA2019/3.

**Comparison.** The new species differs from *D. groehni* in the shorter rostrum, narrower body, coarsely punctate pronotum, and elytral interstriae flat, equal or slightly wider than elytral striae.

**Etymology.** The epithet of this new species is dedicated to Andris Bukejs (Daugavpils) who contributed to the studies of amber Coleoptera.

**Locality.** Baltic amber.

*Dorytomus electrinus* Legalov, 2016 (Figure 5i)

Legalov [44]: 62–64, Figures 4 and 5 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype.

*Dorytomus groehni* Bukejs et Legalov, 2019

Bukejs, Legalov [50], 174–177, Figures 1 and 2 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype.

*Dorytomus korotyaevi* sp. nov. (Figure 5e,f)

urn:lsid:zoobank.org:act:6086E677-CFBD-4674-B0CC-BC8D9F61EE13

**Description.** Female. **Size.** Body length (without rostrum) 3.3 mm; rostrum length 0.7 mm. **Body** black, naked, without scales and setae. **Head** 0.4 times as long as rostrum. Rostrum long, subcylindrical, 4.4 times as long as wide at apex, about 4.0 times as long as wide in middle and at base, 1.3 times as long as pronotum, distinctly curved, finely punctate. Antennal scrobes distinct, directed to eye. Forehead 0.5 times as long as rostrum base width, flattened, punctate. Eyes large, not protruding from margin of head, finely faceted, with more than 15 facets longitudinal to long axis. Temples short. **Antennae** inserted before middle of rostrum laterally, geniculate. Scape 7.2 times as long as width, reaching eye. Funicle seven-segmented. Antennomeres: 2—1.7 times as long as wide, 0.3 times as long as and 1.2 times as wide as scape; 3—1.8 times as long as wide, 0.7 times as long as and 0.7 times as narrow as antennomere 2; 4—1.1 times as long as wide, 0.6 times as long as and 0.9 times as narrow as antennomere 3; 5—1.2 times as long as wide, 0.9 times as long as and 0.9 times as narrow as antennomere 4; 6—equal in length and width, 0.9 times as long as and 1.0 times as wide as antennomere 5; 7—0.7 times as long as wide, 1.0 times as long as and 1.5 times as wide as

antennomere 6; 8—0.7 times as long as wide, 1.2 times as long as and 1.1 times as wide as antennomere 7. Club compact, 1.4 times as long as wide. **Pronotum** bell-shaped. Disc weakly convex, punctate. **Elytra** convex, weakly elongate, 4.2 times as long as pronotum. Greatest width in middle. Humeri distinct. Striae regular and distinct, with rounded and quite deep points. Elytral interstriae weakly convex, wide, 2.3–4.0 times as wide as stria width, finely punctate. Stria 9 merges with stria 10 at level of metacoxae. **Thorax**. Prosternum densely punctate, without postocular lobes. Precoxal part of prosternum 0.8 times as long as procoxa length. Procoxal cavities round, contiguous. Postcoxal part of prosternum 0.6 times as long as procoxa length. Mesocoxal cavities rounded, separated. Metaventrite 1.2 times as long as metacoxa length, weakly convex, punctate. Metepisternum narrow, 7.2 times as long as wide, with row of points. **Abdomen** convex. Ventrites oriented in one plane. Ventrites 1 and 2 quite elongate. Ventrites 3 and 4 quite short. Ventrite 1, 1.6 times as long as metacoxal length. Ventrite 2, 1.1 times as long as ventrite 1. Ventrite 3, 0.6 times as long as ventrite 2. Ventrite 4, equal in length to ventrite 3. Ventrite 5, 2.0 times as long as ventrite 4, with anal setae. **Legs** elongate. Femora weakly clavate, with teeth. Profemora length/width ratio 3.2. Metafemora length/width ratio 2.9. Tibiae almost straight, flattened, with small uncus displaced by inner apical angle and two apical bunches of setae. Protibiae length/width ratio 7.2. Metatibiae length/width ratio 5.0. Tarsi elongate, with pulvilli on underside. Tarsomeres: 1 and 2—conical; 3—bilobed; 5—elongate, with large free claws with teeth.

**Material examined.** Holotype (ISEA), BA2015/6.

**Comparison.** The new species differs from *D. electrinus* in the scape is reaching eye, and finely faceted eyes, with more than 15 facets longitudinal to long axis.

**Etymology.** The epithet of this new species is dedicated to Boris A. Korotyaev (Zoological Institute of the Russian Academy of Sciences, Saint-Petersburg) who contributed to the study of the genus.

**Locality.** Baltic amber.

*Dorytomus nudus* Legalov, 2016 (Figure 5j)

Legalov [45]: 978, Figure 1f therein, plate 5, Figure 3 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

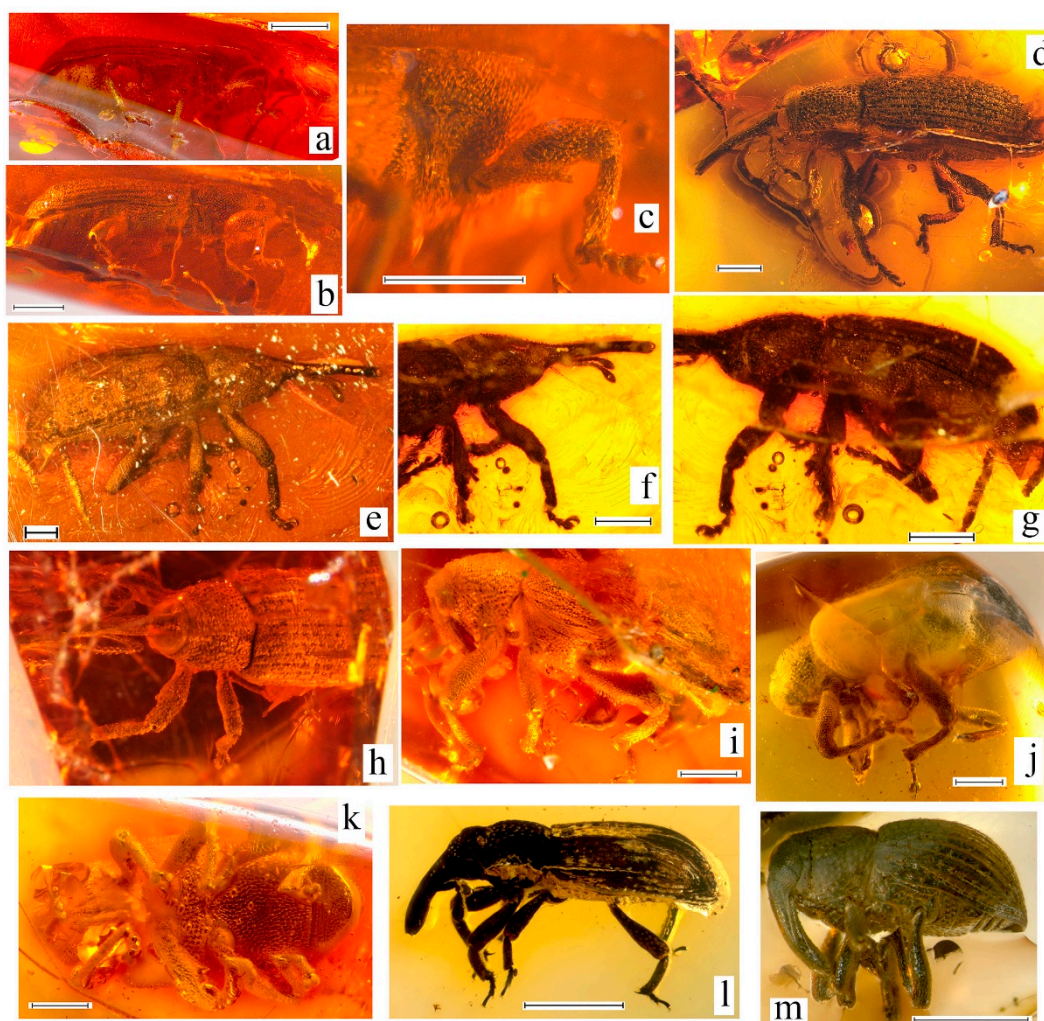
*Dorytomus vlaskini* Legalov, Nazarenko et Perkovsky, 2019

Legalov et al. [72]: 68, 70, Figure 1b therein, plate 8, Figures 2–5 therein.

**Locality.** Rovno amber.

**Remarks.** This species is known by the holotype and two paratypes (SIZK).





**Figure 6.** Habitus of Curculionidae from Baltic amber. (a–c) *Electrotribus rarus* sp. nov., holotype, FEH, no. 651: body, ventrally (a); body, ventro-laterally (b); prothorax and foreleg, laterally (c). (d) *Anchorthorrhinus incertus*, holotype, GPIH, no. 199, body, laterally. (e–g) *Isalcidodes macellus*, holotype, GPIH, no. 200: body, laterally, on the right (e); fore-body, laterally, on the right (f); body, laterally, on the left (g). (h) *Electrotribus theryi*, holotype, CCMCL, no. A6487, dorsally. (i–k) *Electrorhinus friedhelmi* gen. et sp. nov., holotype, FEH, no. 653, body, laterally (i); body, ventrally (k). (j) *E. friedhelmi* gen. et sp. nov., paratype, ISEA, no. BA2019/1, laterally. (l) *Palaeodexipeus kirejtshuki*, holotype, ISEA, no. BA2015/3, body, laterally. (m) *Leiosoma klebsi*, holotype, ISEA, no. BA2013/3, laterally. Scale bars: 1.0 mm. See Section 2 for names of collections.

[Bagoini C.G. Thomson, 1859]

**Remarks.** The genus *Bagous* Germar, 1817 was recorded from Baltic amber [58].

**Molytinae** Schoenherr, 1823

**Key to tribes of Molytinae in Eocene amber**

1. Prosternum with rostral channel bounded by carinae.....2
  - Prosternum without rostral channel bounded by carinae.....4
2. Postcoxal portion of prosternum bounded by carinae.....Aedemonini
  - Postcoxal portion of prosternum not bounded by carinae.....3
3. Rostral channel not reaching mesoventrite.....Sciabregmini
  - Rostral channel reaching mesoventrite.....Cryptorhynchini
4. Meso- and metepisternum, meso- and metepimeron covered with dense plumose scales.....[Magdalinini]
  - Meso- and metepisternum, meso- and metepimeron covered with simple scales.....5

5. Elytral base with anterior projection near interstria 3 which extends over pronotum..... [Mecysolobini]
  - Elytral base straight or weakly concave.....6
6. Metacoxae subglobular. Abdominal process broadly truncate, as wide as or wider than metacoxa. Body naked..... Plintini
  - Metacoxae transverse, elongate. Abdominal process acuminate, much narrower than metacoxae. Body covered with scales.....7
7. Antennal scrobes distinctly visible from above in apical part..... [Molytini]
  - Antennal scrobes not visible from above even in apical part.....8
8. Club segment 1 with dense pubescence, not lustrous. Femora with tooth..... [Acicnemidini]
  - Club segment 1 with quite sparse pubescence, lustrous. Femora without tooth..... [Pissodini]

**Acicnemidini** Lacordaire, 1865

Genus *Electrotribus* Hustache, 1942

Type species: *Electrotribus theryi* Hustache, 1942

= *Paleopissodes* Ulke, 1947

Type species: *Paleopissodes weigangae* Ulke, 1947

= *Anchorhorrhinus* Voss, 1953

Type species: *Anchorhorrhinus incertus* Voss, 1953

= *Isalcidodes* Voss, 1953

Type species: *Isalcidodes macellus* Voss, 1953

= *Protoceletes* Rheinheimer, 2007

Type species: *Protoceletes wolfschwenningerae* Rheinheimer, 2007

#### Key to species of genus *Electrotribus* in Eocene amber

1. Procoxal cavities contiguous. Body small (2.6 mm)..... *E. wolfschwenningerae*
  - Procoxal cavities narrowly separated. Body large (4.1–7. mm)..... 2
2. Body flattened. Scape reaching eyes..... *E. rarus* **sp. nov.**
  - Body convex. Scape not reaching eyes.....3
3. Body covered with dense scales. Forehead distinctly narrower than base of rostrum..... *E. theryi*
  - Body naked. Forehead barely narrower than base of rostrum..... *E. henningseni*

*Electrotribus rarus* **sp. nov.** (Figure 6a–c)

urn:lsid:zoobank.org:act:4FB12AE0-5E4C-4FBF-AF1E-C18B3B508084

**Description.** Male. **Size.** Body length (without rostrum) 5.4 mm; rostrum length 1.2 mm. **Body** black, with dense appressed scales. **Head.** Rostrum quite long, subcylindrical, 5.0 times as long as wide at apex and base, 5.5 times as long as wide in middle, 0.9 times as long as pronotum, almost straight, punctate. Antennal scrobes directed to eye. Eyes large, not protruding from margin of head, finely faceted. Temples shorter than eye. **Antennae** inserted before middle of rostrum, geniculate. Scape 5.8 times as long as width, reaching eye. Antennomeres: 2—2.3 times as long as wide, 0.4 times as long as and 0.9 times as narrow as scape; 3—1.7 times as long as wide, 0.6 times as long as and 0.9 times as narrow as antennomere 2; 4–8—conical. Club compact, 2.9 times as long as wide. **Pronotum** bell-shaped. Disc weakly flattened, punctate. **Elytra** weakly flattened, elongate, 2.5 times as long as pronotum. Greatest width in middle. Humeri distinct. Striae regular and distinct. Elytral interstriae slightly wider than stria width, punctate. Stria 9 full, not merges with stria 10 at level of metacoxae. **Thorax.** Prosternum densely punctate, without postocular lobes. Precoxal part of prosternum 1.2 times as long as procoxa length. Procoxal cavities round, narrowly separated. Postcoxal part of prosternum 0.5 times as long as procoxa length. Mesocoxal cavities rounded, separated. Metaventricle 2.2 times as long as metacoxa length, weakly convex, punctate. Metepisternum narrow, 10.0 times as long as wide, punctate. Sclerolepidia present. **Abdomen** flattened. Ventricle 1, 1.7 times as long as metacoxal length. Ventricle 2, 0.9 times as long as ventricle 1. Ventricle 3, 0.3 times as long as

ventrite 2. Ventrite 4, subequal in length to ventrite 3. Ventrite 5, 1.8 times as long as ventrite 4. **Legs** elongate. Femora weakly clavate, with teeth. Profemora length/width ratio 2.6. Metafemora length/width ratio 2.5. Apex of metafemora reaching apex of ventrite 3. Tibiae almost straight, flattened, dilated approximately in the middle, with large unci. Protibiae length/width ratio 5.0. Metatibiae length/width ratio about 2.8. Tarsi elongate, with pulvilli on underside. Tarsomeres: 1 and 2—conical; 3—bilobed; 5—elongate, with large free claws with teeth. Protarsomeres: 1—1.1 times as long as wide; 2—0.9 times as long as wide, 0.8 times as long as and equal in width to tarsomere 1; 3—0.8 times as long as wide, 1.5 times as long as and 1.6 times as wide as tarsomere 2; 5—2.8 times as long as wide, 1.2 times as long as and 0.4 times as narrow as tarsomere 3.

**Material examined.** Holotype (FEH), no. 651.

**Comparison.** The new species differs from *E. theryi* in the flattened body and scape reaching eye.

**Etymology.** The name of this new species is formed from the Latin word “*rarus*” (rare).

**Locality.** Baltic amber.

*Electrotribus henningseni* (Voss, 1972), **comb. nov.**

*Pissodes henningseni* Voss, 1972

Voss [25]: 180, Figures 10 and 14 therein.

**Locality.** Baltic amber.

**Remarks.** Holotype was not found in the ZMUC. This species should belong to the genus *Electrotribus* due to the narrowly separated procoxal cavities, tooth on the femora, and densely punctured pronotum. The structure of the claws is not known. This species differs from *E. theryi* in the wider forehead and body without scales.

*Electrotribus theryi* Hustache, 1942 (Figures 5k,l and 6d–h)

Hustache [28]: 109, Figure 1 therein.

= *Paleopissodes weigangae* Ulke [29]: 2–4, Figures 1–4 therein, **syn. nov.**

= *Anchorthorrhinus incertus* Voss [24]: 132–133, Figures 9a and 10a therein.

= *Isalcidodes macellus* Voss [24]: 134–135, Figures 9b and 10b therein.

**Locality.** Baltic amber.

**Remarks.** Holotypes are kept in CCMCL (*Electrotribus theryi* Hustache, 1942), ANSP (*Paleopissodes weigangae* Ulke, 1947), and GPIH (*Anchorthorrhinus incertus* Voss, 1953 and *Isalcidodes macellus* Voss, 1953). Kuschel [90] established synonymy for *Paleopissodes weigangae*, *Anchorthorrhinus incertus* (Figure 6d) and *Isalcidodes macellus* (Figure 6e–g), but he did not study the type of *Electrotribus theryi* (Figures 5k–l and 6h). Study of photographs, and comparative material showed that *Paleopissodes weigangae* **syn. nov.** is synonymous with *Electrotribus theryi*. Thanks to the help of Dr. A. Nel (Paris), I managed to obtain photographs of the type of *Electrotribus theryi* from the CCMCL and taken by Didier Berthet (Lyon).

*Electrotribus wolfschwenningerae* (Rheinheimer, 2007)

Rheinheimer [34]: 16–18, Figure 13 therein (*Protoceletes*).

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (SMNS).

[*Pissodini* Gistel, 1856]

**Remarks.** The genus *Pissodes* Germar, 1817 was recorded from Baltic amber [57].

[*Magdalinini* Pascoe, 1870]

**Remarks.** The genus *Magdalis* Germar, 1817 was recorded from Baltic amber [61].

[*Molytini* Schoenherr, 1823]

**Remarks.** The genus *Hylobius* Germar, 1817 was recorded from Baltic amber [72].

**Plinthini** Lacordaire, 1863

**Leiosomatina** Reitter, 1913

Genus *Leiosoma* Stephens, 1829

Type species: *Curculio punctatus* Marsham, 1802 non Scopoli, 1763 (= *Curculio deflexus* Panzer, 1795)

*Leiosoma klebsi* Legalov, 2016 (Figure 6m)

Legalov [45]: 970, 974, Figure 1a therein, Plate 4, Figure 1 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

[**Mecysolobini** Reitter, 1913]

**Remarks.** The genus *Alcidodes* Marshall, 1939 was recorded from Baltic amber [62].

**Sciabregmini** Legalov, Kirejtshuk et Nel, 2019

Genus *Sciabregma* Scudder, 1893

Type species: *Sciabregma rugosum* Scudder, 1893

*Sciabregma squamosa* Legalov, Kirejtshuk et Nel, 2019

Legalov et al. [20]: 70–71, Figure 1c,g therein, plate 18, Figures 2–4 therein.

**Locality.** Oise amber.

**Remarks.** This species is known only by the holotype (MNHN).

**Aedemonini** Faust, 1898

**Remarks.** It is the first record of the tribe in Baltic amber.

Genus *Electrorhinus* gen. nov.

urn:lsid:zoobank.org:act:F2947E0E-0534-4C6C-A226-3F40689E4FFF

Type species: *Electrorhinus friedhelmi* sp. nov.

**Diagnosis.** Body covered with dense decumbent scales. Rostrum quite long, subequal in length to pronotum. Eyes weakly protruding from margin of head, coarsely faceted. Antennae inserted near middle of rostrum, geniculate. Club quite long. Pronotum coarsely rugose, punctate. Elytra weakly convex, with distinct humeri. Elytral stria 9 full. Prosternum with weak postocular lobes. Prosternum with rostral channel bounded by carinae. Apex of rostral channel bounded by carina. Rostral channel reaching mesoventrite. Postcoxal portion of prosternum bounded by carinae. Metaventricle equal in length to metacoxa length, about five times longer than ventrite 3. Sclerolepidia present. Ventrites 1 and 2 long. Ventrites 3 and 4 short. Femora weakly clavate, sulcate beneath, with teeth. Metafemora reaching ventrite 3. Tarsal claws simple.

**Comparison.** The new genus differs from the recent genus *Rhadinomerus* Faust, 1892 by the femora sulcate beneath, shorter metafemora reaching only ventrite 3 and short ventrites 3 and 4.

**Etymology.** The name of the new genus is formed from the Latin “*electrum*” (amber) and the Greek “*rhinos*” (nose). Gender masculine.

**Remarks.** The new genus belongs to Aedemonini, as it has the prosternum with a rostral channel bounded by the carinae, apex of the rostral channel bounded by the carina, the rostral channel reaching the mesoventrite, postcoxal portion of the prosternum bounded by the carinae and present sclerolepidia.

*Electrorhinus friedhelmi* sp. nov. (Figure 6i–k)

urn:lsid:zoobank.org:act:2D5A7817-2721-4E56-9848-F02417CDDBED

**Description.** Male. **Size.** Body length (without rostrum) 5.7–6.2 mm; rostrum length 1.3–1.4 mm. **Body** black, with dense decumbent quite narrow scales. **Head.** Rostrum quite long, 3.8 times as long as wide at apex, 4.2 times as long as wide in middle, 3.5 times as long as wide at base, 0.9–1.1 times as long as pronotum, weakly curved, punctate. Antennal scrobes directed under rostrum. Eyes

large, weakly protruding from margin of head, coarsely faceted. Temples short. **Antennae** inserted near middle of rostrum, geniculate. Scape 7.0 times as long as width, not reaching eye. Funicle with long conical segments. Antennomeres: 2—4.9 times as long as wide, 0.5 times as long as and 0.7 times as narrow as scape; 3—4.0 times as long as wide, 0.6 times as long as and 0.7 times as narrow as antennomere 2. Club compact, 3.0 times as long as wide. **Pronotum** bell-shaped. Disc weakly convex, coarsely rugose-punctate. **Elytra** weakly convex, quite elongate, 2.8–2.9 times as long as pronotum. Greatest width in middle. Humeri distinct. Striae regular and distinct. Elytral interstriae wide, punctate, 2.3–3.2 times as long as width of striae. Stria 9 full, not merges with stria 10 at level of metacoxae. **Thorax**. Prosternum densely punctate, with weak postocular lobes. Precoxal part of prosternum 1.3 times as long as procoxa length. Procoxal cavities round, separated. Postcoxal part of prosternum 0.7 times as long as procoxa length. Mesocoxal cavities rounded, separated. Metaventricle convex, equal in length to metacoxa length, 4.9 times as long as ventrite 3, weakly convex, punctate. Metepisternum narrow, 10.8 times as long as wide, punctate. Sclerolepidia present. **Abdomen** flattened. Ventrite 1, slightly wider than metacoxal length. Ventrite 2, 1.3 times as long as ventrite 1. Ventrite 3, 0.2 times as long as ventrite 2. Ventrite 4, equal in length to ventrite 3. Ventrite 5, 4.3 times as long as ventrite 4. **Legs** elongate. Femora weakly clavate, sulcate beneath, with teeth. Profemora length/width ratio 3.6. Mesofemora length/width ratio 3.1–3.5. Metafemora length/width ratio 3.7, reaching ventrite 3. Tibiae weakly curved, flattened, with uncus. Protibiae length/width ratio 7.1. Metatibiae length/width ratio 4.8–5.2. Tarsi elongate, with pulvilli on underside. Tarsomeres: 1 and 2—conical; 3—bilobed; 5—elongate, with large free claws without teeth. Metatarsomeres: 1—2.5 times as long as wide; 2—1.4 times as long as wide, 0.6 times as long as and equal in width to tarsomere 1; 3—0.7 times as long as wide, equal in length as and 2.0 times as wide as tarsomere 2; 5—5.7 times as long as wide, 1.5 times as long as and 0.2 times as wide as tarsomere 3.

**Material examined.** Holotype (FEH), no. 653 and paratype (ISEA), no. BA2019/1.

**Etymology.** The epithet of this new species is dedicated to Friedhelm Eichmann (Hannover) who provided one specimen of this species for study.

**Locality.** Baltic amber.

#### **Cryptorhynchini** Schoenherr, 1826

##### **Key to subtribes of Cryptorhynchini in Eocene amber**

1. Metaventricle short, usually shorter than ventrite 3. Abdominal process as broad as coxa. Metepisternum narrow or partly hidden, or metepisternal sutures absent. Elytra with more or less reduced humeri.....[Tylodina]  
—Metaventricle more or less elongate, longer than ventrite 3. Abdominal process narrower than coxa. Metepisternum distinct, broader. Elytra often with rectangular humeri.....Cryptorhynchina

#### **Cryptorhynchina** Schoenherr, 1826

**Remarks.** The genus *Cryptorhynchus* Illiger, 1807 was recorded from Baltic amber [61].

##### **Key to genera of Cryptorhynchina in Eocene amber**

1. All femora without teeth.....*Oisecalles*  
—All femora with teeth.....*Succinacalles*

Genus *Oisecalles* Legalov, Kirejtshuk et Nel, 2019

Type species: *Oisecalles latosquamosus* Legalov, Kirejtshuk et Nel, 2019

*Oisecalles latosquamosus* Legalov, Kirejtshuk et Nel, 2019

Legalov et al. [20]: 72, Figure 2a,b,d,e therein, plate 18, Figures 5 and 6 therein; plate 18, Figure 1 therein.

**Locality.** Oise amber.

**Remarks.** This species is known only by the holotype (MNHN).

Genus *Succinacalles* Zherikhin, 1971

Type species: *Succinacalles unicus* Zherikhin, 1971

*Succinacalles unicus* Zherikhin, 1971

Zherikhin [26]: 199, 207–208, Figure 5 therein, pl. X., Figure 3a,b therein.

**Locality.** Baltic amber.

**Remarks.** The holotype should be deposited in PIN; however, it was not found there.

[*Tylodina* Lacordaire, 1865]

**Remarks.** The genus *Acalles* Schoenherr, 1825 was recorded from Baltic amber [61].

[*Lixinae* Schoenherr, 1823]

[*Lixini* Schoenherr, 1823]

**Remarks.** The genus *Lixus* Fabricius, 1801 was recorded from Baltic amber [61].

**Dryophthorinae** Schoenherr, 1825

**Key tribes of Dryophthorinae in Eocene amber**

1. Procoxal cavities contiguous. Tarsi with very small fourth tarsomere.....

Stromboscerini

—Procoxal cavities separated. Tarsi with distinct five tarsomeres..... Dryophthorini

**Dryophthorini** Schoenherr, 1825

**Remarks.** The genus *Dryophthorus* Germar, 1824 was recorded from Baltic amber [61].

Genus *Rhinoporkus* Legalov, Kirejtshuk et Nel, 2019

Type species: *Rhinoporkus graciosus* Legalov, Kirejtshuk et Nel, 2019

*Rhinoporkus graciosus* Legalov, Kirejtshuk et Nel, 2019

Legalov et al. [20]: 74, 76, Figure 2c,f,g therein, plate 19, Figures 2–5 therein.

**Locality.** Oise amber.

**Remarks.** This species is known only by the holotype (MNHN).

**Stromboscerini** Lacordaire, 1865

**Key to genera of Stromboscerini in Eocene amber**

1. Funicle four-segmented..... *Rovnoslonik*

—Funicle six-segmented.....2

2. Elytral interstriae carinate.....*Palaeodexipeus*

—Elytral interstriae convex.....*Stenommatomorphus*

Genus *Palaeodexipeus* Legalov, 2016

Type species: *Palaeodexipeus kirejtshuki* Legalov, 2016

*Palaeodexipeus kirejtshuki* Legalov, 2016 (Figure 6l)

Legalov [44]: 60–62, Figures 2 and 3 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

Genus *Rovnoslonik* Legalov, Nazarenko et Perkovsky, 2019

Type species: *Rovnoslonik damzeni* Legalov, Nazarenko et Perkovsky, 2019

*Rovnoslonik damzeni* Legalov, Nazarenko et Perkovsky, 2019

Legalov et al. [72]: 64, 66, Figure 1a,g therein, pl. 7, Figures 1–4 therein.

**Locality.** Rovno amber.

**Remarks.** This species is known only by the holotype (ISEA).

Genus *Stenommatomorphus* Nazarenko, 2009

Type species: *Stenommatomorphus hexarthrus* Nazarenko, 2009

*Stenommatomorphus hexarthrus* Nazarenko, 2009

Nazarenko, Perkovsky [66]: 1100, Figure 1 therein, pl. III, Figures 1–3 therein.

**Locality.** Rovno amber.

**Remarks.** This species is known only by the holotype (SIZK).

**Cossoninae** Schoenherr, 1825

**Key to tribes of Cossoninae in Eocene amber**

1. Mesoventrite more or less strongly depressed below level of metaventrite.....[Rhyncolini]  
— Mesoventrite on level of metaventrite.....2
2. Procoxal cavities narrowly separated. Humeri rounded.....Dryotribini  
— Procoxal cavities widely separated. Humeri distinct.....[Cossonini]

[Rhyncolini Gistel, 1856]

**Remarks.** The genera *Rhyncolus* Germar, 1817 and *Choerorhinus* Fairmaire, 1858 were recorded from Baltic amber [61].

**Dryotribini** LeConte, 1876

**Key to genera of Dryotribini in Eocene amber**

1. Funicle 4–6-segmented.....2  
— Funicle seven-segmented.....3
2. Funicle four-segmented.....*Necrodryophthorus*  
— Funicle five-segmented.....*Synommatodes*  
— Funicle six-segmented.....*Electrocossonus*
3. Rostrum thick and straight, 1.8 times as long as wide in middle.....*Ampharthropelma*  
— Rostrum slender and curved, 2.7–6.9 times as long as wide in middle.....*Caulophilus*

Genus *Necrodryophthorus* Voss, 1953

Type species: *Necrodryophthorus inquilinus* Voss, 1953

*Necrodryophthorus inquilinus* Voss, 1953

Voss [24]: 137, Figure 11 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (GPIH).

Genus *Synommatodes* Voss, 1953

Type species: *Synommatodes patruelis* Voss, 1953

*Synommatodes patruelis* (Voss, 1953) (Figure 7f)

Voss [24]: 138, Figure 12 therein (*Synommatodes*).

**Locality.** Baltic amber.

**Remarks.** The holotype of this species deposited in GPIH.

Genus *Electrocossonus* gen. nov.

urn:lsid:zoobank.org:act:144A9B84-F5C9-4FD0-BA65-65AE67C55E61

Type species: *Electrocossonus kirejtshuki* sp. nov.

**Diagnosis.** Body covered with decumbent narrow scales. Rostrum shorter than pronotum, without secondary scrobes. Antennal scrobes directed under rostrum. Eyes coarsely faceted, only slightly protruding from margin of head. Antennae inserted in middle of rostrum. Antennomere quite long, not reaching eye. Funicle six-segmented. Antennomere 2 long, conical. Antennomeres 3–8 wide, conical. Antennal club compact. Elytra quite robust. Humeri weakly smoothed. Elytral



interstriae as wide as or narrower than width of striae. Prothorax with distinct postocular lobes. Procoxal cavities narrowly separated. Suture between metepisternum and metaventrite strongly convex. Abdomen flattened. Ventrites 1, 2, and 5, long. Ventrites 3 and 4, short. Femora clavate, without tooth. Tarsi elongate, with pulvilli on underside. Tarsomere 3 weakly bilobed. Claws free, simple.

**Etymology.** The name is formed from the Latin “*electrum*” (amber) and generic name “*Cossonus*”. Gender masculine.

**Comparison.** The new genus differs from other genera of the tribe in the six-segmented funicle. From the genus *Caulophilus*, it also differs in a more robust body and strongly convex suture between the metepisternum and metaventrite.

**Remarks.** The new genus belongs to Cossoninae, as it has the protibiae with a notch in the distal half and a row of dense erect setae, metatibiae lacking an apical group of setae and tarsomere 3 weakly bilobate. The rostrum is longer than its width and narrowly separated cavities indicate affinity to Dryotribini.

*Electrocossonus kirejtshuki* sp. nov. (Figure 7b,c)

urn:lsid:zoobank.org:act:E65A36B5-B3CD-4F1A-B377-D08ECB3A4E66

**Description.** Male. **Size.** Body length (without rostrum) 2.4 mm. Rostrum length 0.5 mm. **Body** black, covered with decumbent narrow scales. **Head** densely punctate. Rostrum quite long, about 0.7 times as long as pronotum, 4.5 times as long as width at apex, 3.0 times as long as width at mid-rostrum and at base, distinctly curved, punctate. Mandibles small. Antennal scrobes deep, lateral, directed under rostrum. Secondary scrobes absent. Forehead quite wide. Eyes rounded, large, coarsely faceted, almost not protruding from margin of head. Vertex weakly convex, densely punctate. Temples short. **Antennae** inserted in middle of rostrum, laterally. Antennomeres: 1—long, 2.6 times as long as wide, not reaching eye; 2—long-conical, 2.2 times as long as wide, 0.6 times as long as and about 0.7 times as narrow as scape; 3—wide, conical; 3—0.7 times as long as wide, 0.2 times as long as and 0.7 times as narrow as antennomere 2; 4—0.8 times as long as wide, 1.3 times as long as and 1.1 times as wide as antennomere 3; 5—0.7 times as long as wide, 0.8 times as long as and 0.9 times as narrow as antennomere 4; 6—0.6 times as long as wide, 0.9 times as long as and 1.1 times as wide as antennomere 5; 7—0.7 times as long as wide, 1.4 times as long as and 1.2 times as wide as antennomere 6. Antennal club compact, about 1.8 times as long as wide. **Pronotum** almost bell-shaped. Disc flattened, densely punctate. Intervals between points narrower than diameter of points. **Elytra** quite robust, convex, 1.6 times as long as pronotum. Humeri weakly smoothed. Striae deep, distinct, regular and wide. Stria 9 not shortened. Interstriae quite narrow, weakly convex, 0.6–1.0 times as long as width of striae. **Thorax.** Prothorax with distinct postocular lobes, coarsely punctate. Precoxal part of prosternum 1.1 times as long as procoxa length. Procoxal cavities rounded, narrowly separated. Postcoxal part of prosternum 0.7 times as long as procoxa length. Mesocoxal cavities rounded and separated. Metaventrite 1.9 times as long as length of mesocoxa, flattened, densely punctate. Suture between metepisternum and metaventrite strongly convex. Metepisternum 3.1 times as long as wide in middle. Metacoxal cavities dilated, separated by apex of ventrite 1. **Abdomen** flattened. Ventrite 1, 1.3 times as long as metacoxae. Ventrite 2, 0.9 times as long as ventrite 1. Ventrite 3, 0.5 times as long as ventrite 2. Ventrite 4, equal in length to ventrite 3. Ventrite 5, 2.5 times as long as ventrite 4. **Legs** quite long. Procoxae spherical. Femora clavate, without tooth. Profemora 3.0 times as long as wide in middle. Metafemora 3.6 times as long as wide in middle. Tibiae almost straight, weakly flattened, with large uncus. Protibia 4.0 times as long as wide in middle, with notch in distal half, and row of dense erect setae. Metatibia 4.1 times as long as wide in middle, lacking apical bunch of setae. Tarsi elongate, with pulvilli on underside. Tarsomeres: 1 and 2—conical; 3—weakly bilobed; 5—elongate. Claws large, free, without teeth.

**Material examined.** Holotype (ISEA), no. BA2017/5.

**Etymology.** The epithet of this new species is dedicated to entomologist Dr. Alexander G. Kirejtshuk (Zoological Institute of the Russian Academy of Sciences, Saint-Petersburg).

**Locality.** Baltic amber.



Genus *Ampharthropelma* Voss, 1972

Type species: *Ampharthropelma decipiens* Voss, 1972

*Ampharthropelma decipiens* Voss, 1972 (Figure 7a,h)

Voss [25]: 177–178, Figures 7, 8 and 13 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ZMUC).

Genus *Caulophilus* Wollaston, 1854

Type species: *Caulophilus sculpturatus* Wollaston, 1854 (= *Rhyncolus oryzae* Gyllenhal, 1838)

#### Key to species of genus *Caulophilus* in Eocene amber

1. Body covered with setaceous scales..... 2
  - Body covered with narrow scales.....3
2. Rostrum slender, distinctly curved. Pronotum distinctly narrower than base of elytra..... *C. rarus*
  - Rostrum robust, weakly curved. Pronotum slightly narrower than base of elytra ..... *C. sucinopunctatus*
3. Body (without rostrum) smaller, body length 1.6 mm. Elytra 2.0 times as long as wide medially ..... *C. squamosus*
  - Body (without rostrum) larger, body length 1.9–2.3 mm. Elytra 2.2–2.3 times as long as wide medially.....4
4. Punctures in elytral striae round. Elytra with fine hardly noticeable setae. Humeri more strongly smoothed. Body (without rostrum) smaller, body length 1.9 mm..... *C. martynovae*
  - Punctures in elytral striae oval or rounded rectangular. Elytra with distinct setae. Humeri weakly smoothed. Body (without rostrum) larger, body length 2.2 mm..... *C. zherikhini*

*Caulophilus martynovae* Legalov, Nazarenko et Perkovsky, 2019

Legalov et al. [72]: 66, 68, Figure 1c,d therein, plate 7, Figure 5 therein; plate 8, Figure 1 therein.

**Locality.** Rovno amber.

**Remarks.** This species is known only by the holotype (SIZK).

*Caulophilus rarus* Legalov, 2016 (Figure 7e)

Legalov [45]: 974–975, Figure 1b therein, plate 4, Figure 2 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

*Caulophilus squamosus* Legalov, 2016 (Figure 7d)

Legalov [45]: 975, Figure 1c therein, plate 4, Figure 3 therein.

**Locality.** Baltic amber.

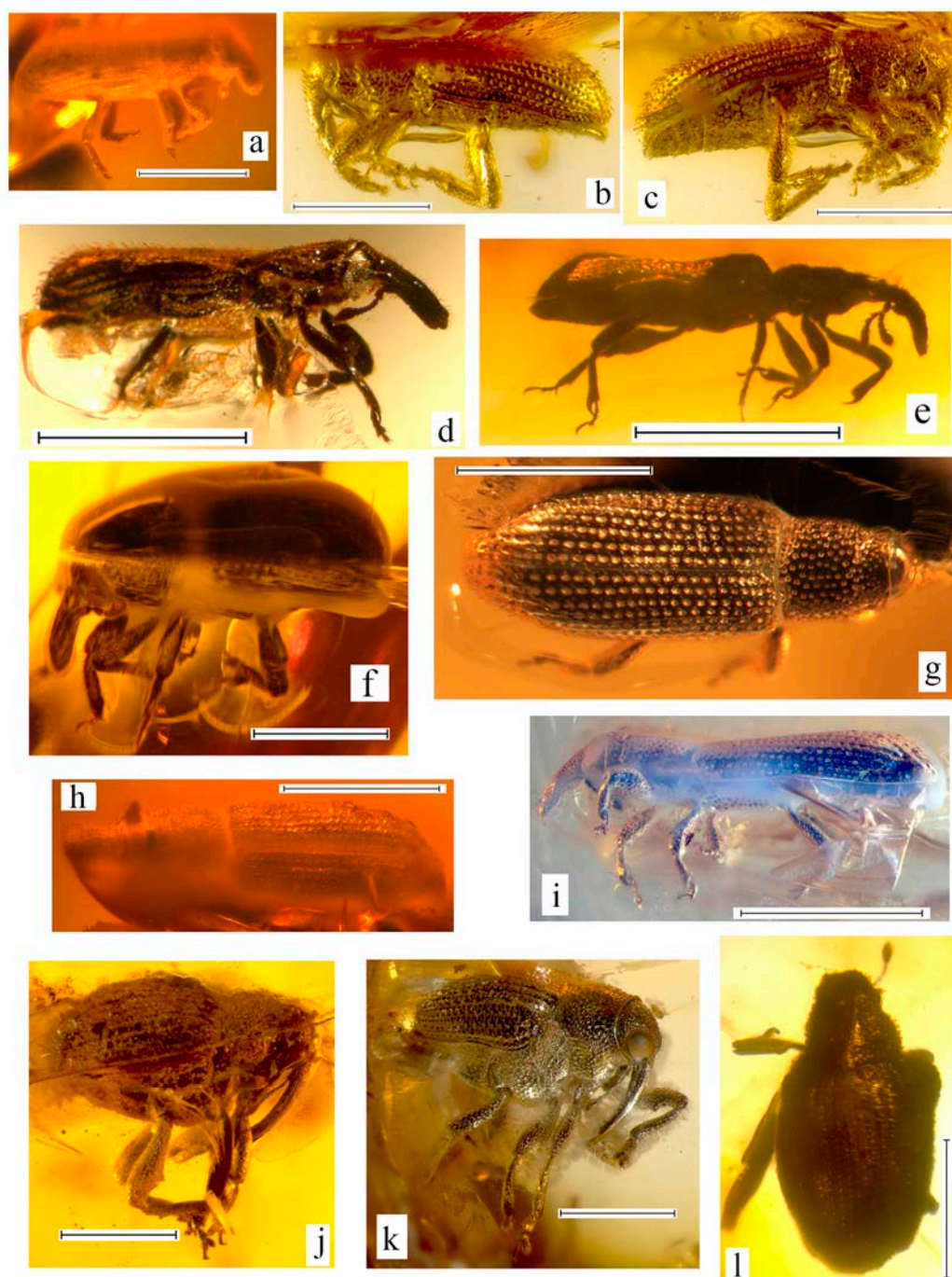
**Remarks.** This species is known only by the holotype (ISEA).

*Caulophilus sucinopunctatus* (Kuska, 1992) (Figure 7g,i)

Kuska [31]: 112, Figures 6–9 therein (*Phloeophagus*).

**Locality.** Baltic amber.

**Remarks.** Holotype is kept in the EIW.



**Figure 7.** Habitus of Curculionidae from Baltic amber. (a,h) *Ampharthropelma decipiens*, holotype, ZMUC, no. 958: body, laterally (a); body, dorsally (h). (b,c) *Electrocossonus kirejtshuki*, holotype, ISEA, no. BA2017/5: body, laterally, on the left (b); body, laterally, on the right (c). (d) *Caulophilus squamosus*, holotype, ISEA, no. BA2012/9, body, laterally. (e) *C. rarus*, holotype, ISEA, no. BA2011/5, body, laterally. (f) *Synommotodes patruelis*, holotype, GPIH, no. 202, body, laterally. (g) *Caulophilus sucinopunctatus*, holotype, EIW, no. 554, body, dorsally. (i) *Caulophilus sucinopunctatus*, specimen, ISEA, no. BA2011/3, body, laterally. (j) *Ceutorhynchus succinus*, holotype, ISEA, no. BA2012/3, body, laterally. (k) *C. electrinus*, holotype, ISEA, no. BA2012/10, body, laterally. (l) *C. alekseevi*, holotype, CVIA, no AWI-005, body, dorsally. Scale bars: 1.0 mm. See Section 2 for names of collections.

*Caulophilus zherikhini* Nazarenko, Legalov et Perkovsky, 2011

Nazarenko et al. [67]: 288, 290, Figure 1 therein, pl. 7, Figures 1–9 therein.

**Locality.** Rovno amber.

**Remarks.** This species is known only by the holotype (SIZK).

[Cossonini Schoenherr, 1825]

**Remarks.** The genus *Mesites* Schoenherr, 1838 was recorded from Baltic amber [61].

**Conoderinae** Schoenherr, 1833

**Key to supertribes of Conoderinae in Eocene amber**

1. Eyes large, subcontiguous dorsally separated by very narrow forehead.....Conoderitae
- Eyes not large. Forehead more or less wide. Body more or less rounded, snout.....Ceutorhynchitae

**Ceutorhynchitae** Gistel, 1848

**Key to tribes of Ceutorhynchitae in Eocene amber**

1. Rostrum quite short, no more or slightly longer than 3× wide at apex, wider than width of profemur or equal in width to.....Phytobiini
- Rostrum distinctly longer than 3× wide at apex, narrower than width of profemur.....Ceutorhynchini

[Phytobiini Gistel, 1856]

**Remarks.** The genus *Rhinoncus* Schoenherr, 1825 was recorded from Baltic amber [61].

**Ceutorhynchini** Gistel, 1848

**Key to genera of Ceutorhynchini in Baltic amber**

1. Meso- and metaventrite without rostral channel. Body piceous.....*Ceutorhynchus*
- Meso- and metaventrite with rostral channel. Body ferruginous.....*Baltocoeliodes*

Genus *Ceutorhynchus* Germar, 1824

Type species: *Curculio assimilis* Paykull, 1792

**Key to species of genus Ceutorhynchus in Baltic amber**

1. Tarsomere 5 long. Ventrite 5 with long erect hairs apically. Pronotum with deep medial groove.....*C. alekseevi*
- Tarsomere 5 rather short. Ventrite 5 without long erect hairs apically. Pronotum with weak longitudinal medial groove.....2
2. Intervals of elytra with one or two rows of tubercles. Punctures of pronotum larger, with shorter scales. Femora with large teeth.....*C. electrinus*
- Intervals of elytra punctate. Punctures of pronotum smaller, with longer scales. Intervals narrower, with longer and more erect scales. Femora with small teeth.....*C. succinus*

*Ceutorhynchus alekseevi* Legalov, 2016 (Figure 7l)

Legalov [45]: 976–977, Figure 1e therein, plate 4, Figure 5 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (SIZK).

*Ceutorhynchus electrinus* Legalov, 2016 (Figure 7k,j)

Legalov [45]: 976, Figure 1d therein, plate 4, Figure 4 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (ISEA).

*Ceutorhynchus succinus* Legalov, 2013 (Figure 7k)

Legalov [41]: 73–74, Figures 25 and 26 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (ISEA).

Genus *Baltocoeliodes* Legalov et Bukejs, 2018

Type species: *Baltocoeliodes sontagae* Legalov et Bukejs, 2018

*Baltocoeliodes sontagae* Legalov et Bukejs, 2018

Legalov, Bukejs [47]: 186–189, Figures 1 and 2 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (MAIG).

**Conoderitae** Schoenherr, 1833

**Remarks.** The specimen of “tropischen Zygodinae” was recorded from Baltic amber [62].

**Conoderini** Schoenherr, 1833

Genus *Jantarhinus* Legalov, Kirejtshuk et Nel, 2019

Type species: *Jantarhinus compressus* Legalov, Kirejtshuk et Nel, 2019

*Jantarhinus compressus* Legalov, Kirejtshuk et Nel, 2019

Legalov et al. [20]: 76–77, Figures 2h and 3a,b therein, plate 19, Figure 6 therein; Figures 1 and 2 therein.

**Locality.** Oise amber.

**Remarks.** This species is known only by the holotype (MNHN).

**Curculioninae** Latreille, 1802

**Key to tribes of Curculioninae in Eocene amber**

1. Funicle five-segmented..... [Mecinini]
- Funicle seven- or six-segmented.....2
2. Metatibiae narrowed apically, with oblique apical comb of setae. Eyes large, strongly prominent or confluent on forehead..... Rhamphini
- Metatibiae not narrowed apically, with transverse apical comb of setae. Eyes simple.....3
3. Mandibles vertically articulated.....Curculionini
- Mandibles horizontal articulated.....4
4. Posterior margins of ventrites 2–4 curved distinctly posteriad on lateral sides. Antennal scrobes directed under eyes.....Tychiini
- Posterior margins of ventrites 2–4 straight. Antennal scrobes directed to eyes.....5
5. Precoxal portion of prosternum short..... [Anthonomini]
- Precoxal portion of prosternum elongate.....6
6. Pygidium covered by elytra. Tibiae uncinat..... Ellescini
- Pygidium exposed. Tibiae without uncus.....7
7. Antennal scrobes oblique directed toward the rostrum base. Antennae inserted close to rostrum apex. Eyes very large.....Eugnomini
- Antennal scrobes directed to eyes. Antennae inserted close to rostrum middle. Eyes small.....Acalyptini

**Acalyptini** Thompson, 1859

Genus *Jantaronosik* Legalov, Kirejtshuk et Nel, 2019

Type species: *Jantaronosik nebulosus* Legalov, Kirejtshuk et Nel, 2019

*Jantaronosik nebulosus* Legalov, Kirejtshuk et Nel, 2019

Legalov et al. [20]: 78, Figure 3d,e therein, plate 20, Figures 3 and 4 therein.

**Locality.** Oise amber.

**Remarks.** This species is known only by the holotype (MNHN).

**Curculionini** Latreille, 1802

**Remarks.** The key to species is based on the key from Pelsue and O’Brien [91].

**Key to subtribes of Curculionini in Baltic amber**

1. Tarsal claws connate, simple. Trochanter with stiff bristle.....Erganiina  
   — Tarsal claws free, appendiculate or not. Trochanter without stiff bristle.....2
2. Tarsal claws simple. Pygidium covered by elytra in males.....Timolina  
   — Tarsal claws appendiculate. Pygidium exposed in males.....[Curculionina]

**Erganiina** Pelsue et O'Brien, 2011

Genus *Pseudoergania* Legalov, 2019

Type species: *Pseudoergania perkovskyi* Legalov, 2019

*Pseudoergania perkovskyi* Legalov, 2019 (Figure 8c)

Legalov [51]: 56–57, pl. 5 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

**Timolina** Heller, 1925

Genus *Baltocurculio* **gen. nov.**

urn:lsid:zoobank.org:act:E8B220C6-6553-4AD0-AA30-B14E49ECC18A

Type species: *Baltocurculio manukyani* **sp. nov.**

**Diagnosis.** Body large, covered with appressed and decumbent scales. Rostrum cylindrical, very long. Mandibles articulated in vertical plane, triangular. Antennal scrobes lateral, directed to eye. Eyes oval, quite small. Antennae inserted in middle of rostrum. Scape not reaching eye. Funicle seven-segmented. Antennomere 3 longer than antennomere 2. Antennal club compact. Pronotum almost bell-shaped. Base of pronotum biconcave. Scutellum convex, longer than wide. Elytra almost trapezoidal. Lateral margin of elytra not sinuate above metepisternum. Humeri distinctly convex. Greatest width in humeri. Stria 9 not shortened. Interstriae wide and convex. Prothorax without postocular lobes. Pre- and postcoxal parts of prosternum short. Metepisternum quite narrow. Abdomen weakly flattened. Ventrites 1 and 2 not elongate, and ventrites 3 and 4 not short. Pygidium covered by elytra. Femora clavate, with large tooth. Metafemora slightly enlarged, reaching apex of abdomen. Pro- and mesotibiae with mucro. Claws weakly diverging, free, without teeth.

**Etymology.** The name is formed from the Latin “*balticum*” (Baltic) and generic name “*Curculio*”. Gender neuter.

**Comparison.** The new genus differs from the African genus *Timola* Pascoe, 1886 in the metafemora reaching apex of abdomen, small eyes, not shortened ventrite 3 and 4, elongate body and long rostrum. It is distinguished from the South American genus *Megaoculis* Pelsue et O'Brien, 2011 by the quite simple claws, small eyes, very long rostrum, slightly enlarged metafemur and body without erect scales.

**Remarks.** Mandibles are vertically articulated, rostrum long and thin, and femora with teeth suggest that the new genus belongs to Curculionini. Simple free tarsal claws and pygidium covered by elytra in male support its assignment to Timolina.

*Baltocurculio manukyani* **sp. nov.** (Figure 8a,b)

urn:lsid:zoobank.org:act:C67306A3-968A-4EEC-8A80-14CB8F18E5A7

**Description.** Male. **Size.** Body length (without rostrum) 6.6 mm. Rostrum length 3.1 mm. **Body** black, covered with dense appressed and sparse decumbent brownish scales. **Head** almost spherical, transversely wrinkled ventrally. Rostrum almost cylindrical, long, about 1.7 times as long as pronotum, about 16.0 times as long as width at apex and at base, about 13.3 times as long as wide at mid-rostrum, distinctly curved, finely punctate. Mandibles articulated in vertical plane, small, triangular. Antennal scrobes lateral, directed to eye. Forehead quite wide, about 1.6 times as wide as rostrum base width, convex, densely punctate. Eyes oval, quite small, weakly convex, not protruding from margin of head. Vertex weakly convex, densely punctate. Temples quite short. **Antennae** inserted in middle of rostrum, laterally. Antennomeres: 1—long, about 7.0 times as long as wide, not reaching eye; 2–8 (funicle)—conical; 2—about 1.8 times as long as wide, about 0.2 times

as long as and about 0.8 times as narrow as scape; 3—about 2.9 times as long as wide, about 1.4 times as long as and about 0.9 times as narrow as antennomere 2; 4—about 1.8 times as long as wide, about 0.6 times as long as and about 0.9 times as narrow as antennomere 3; 5—about 2.0 times as long as wide, subequal in length and about 0.9 times as narrow as antennomere 4; 6—about 2.0 times as long as wide, about 0.7 times as long as and about 0.7 times as narrow as antennomere 5; 7—about 1.6 times as long as wide, subequal in length and about 1.3 times as wide as antennomere 6; 8—about 0.8 times as long as wide, about 0.8 times as long as and about 1.6 times as wide as antennomere 7. Antennal club compact, about 1.6 times as long as wide. **Pronotum** almost bell-shaped, about 1.4 times as long as wide apically, little longer than wide in middle and basally. Sides weakly rounded in first half and almost subparallel in second half. Disc flattened, densely punctate. Base of pronotum biconcave. **Mesonotum**. Scutellum convex, about 1.8 times as long as wide. **Elytra** almost trapezoidal, weakly convex, about 2.7 times as long as pronotum, about 1.7 times as long as wide basally, about 2.4 times as long as wide in middle, about 3.5 times as long as wide in apical quarter. Lateral margin of elytra not sinuate above metepisternum. Humeri convex. Greatest width in humeri. Striae deep, distinct, regular and narrow. Stria 9 not shortened, not merged with stria 10 at level of metacoxae. Interstriae quite wide, weakly convex, 2.5–4.0 times as long as width of striae. Elytral apices rounded separately. **Thorax**. Prothorax without postocular lobes, coarsely punctate. Pre- and postcoxal parts of prosternum short, subequal in length. Precoxal part of prosternum about 0.4 times as long as procoxa length. Procoxal cavities rounded, contiguous. Mesocoxal cavities rounded and separated. Metaventrite slightly longer than length of mesocoxa, weakly convex, densely punctate. Metepisternum about 9.6 times as long as wide in middle. Metacoxal cavities dilated, subequal in length to metaventrite, separated by apex of ventrite 1. **Abdomen** weakly flattened. Ventrite 1 about 0.4 times as long as metacoxae. Ventrite 2 about 1.6 times as long as ventrite 1. Ventrite 3 about 1.2 times as long as ventrite 2. Ventrite 4 about 0.8 times as long as ventrite 3. Ventrite 5 about 1.4 times as long as ventrite 4. Pygidium covered by elytra. **Legs** elongate. Procoxae conical. Femora clavate, with large tooth in apical third. Profemora about 4.4 times as long as wide after tooth. Metafemora about 6.0 times as long as wide after tooth. Tibiae almost straight, weakly flattened, weakly widened apically. Pro- and mesotibiae with mucro. Protibia about 7.6 times as long as wide in middle. Metatibia about 7.4 times as long as wide in middle. Tarsi elongate, with pulvilli on underside. Tarsomeres: 1 and 2—conical; 3—bilobed; 5—elongate. Claws large, diverging, free, without teeth. Protarsomeres: 1—about 1.6 times as long as wide; 2—about 1.1 times as long as wide, about 0.7 times as long as and about 1.1 times as wide as tarsomere 1; 3—subequal in length and width, about 1.6 times as long as and about 1.7 times as wide as tarsomere 2; 5—about 5.7 times as long as wide, about 1.3 times as long as and about 0.2 times as narrow as tarsomere 3.

**Material examined.** Holotype (KRAM), no. BX 100-19.

**Etymology.** The epithet of this new species is dedicated to paleoentomologist Dr. Andranik R. Manukyan (Kaliningrad Regional Amber Museum).

**Locality.** Baltic amber.

[**Curculionina** Latreille, 1802]

**Remarks.** The genus *Balaninus* Germar, 1817 (= *Curculio* Linnaeus, 1758) was recorded from Baltic amber [61]. Representatives of this subtribe were not found by the author, but the probability of finding them is high, because eight species of oak are described from Baltic amber [92].

**Ellescini** C.G. Thomson, 1859

**Key to genera of Ellescini in Baltic amber**

1. Stria 9 not shortened. Body covered with appressed and decumbent scales.....*Succinostyphlus*  
—Stria 9 short, fused with stria 10 at level of metacoxae. Body covered with appressed scales.....*Pachytychius*

Genus *Succinostyphlus* Kuska, 1996

Type species: *Succinostyphlus mroczkowskii* Kuska, 1996

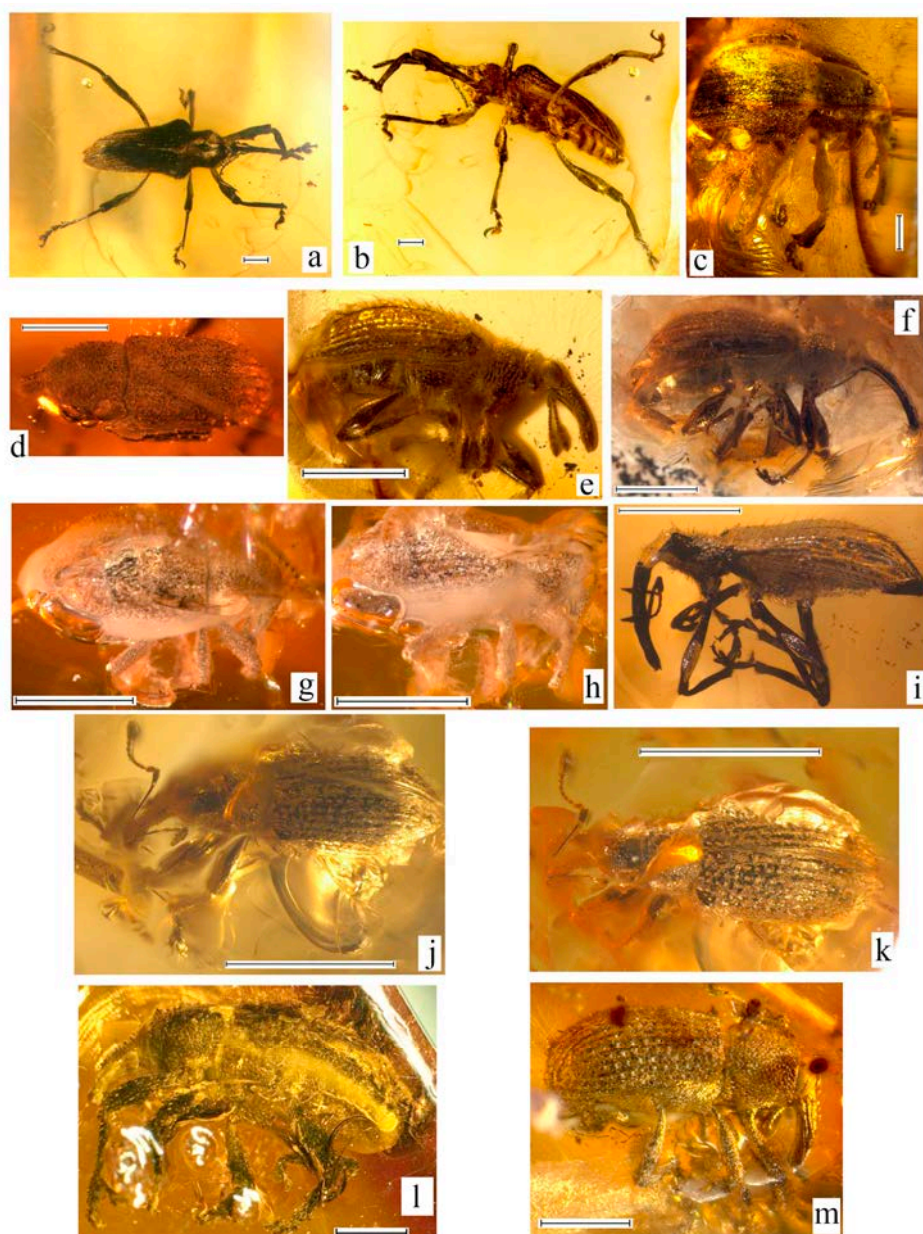


**Remarks.** Probably the record of the genus *Pseudostyphlus* Tournier, 1874 from Baltic amber [61] concerns to this genus.

*Succinostyphlus mroczkowskii* Kuska, 1996 (Figure 8d,l,m)

Kuska [32]: 15, Figure 8 therein.

= *Electrotribus erectosquamata* Rheinheimer, 2007, **syn. nov.**



**Figure 8.** Habitus of Curculioninae from Baltic amber. (a,b) *Baltocurculio manukyani* **gen. et sp. nov.**, holotype, KRAM, no. BX 100-19: body, dorsally (a); body, ventrally (b). (c) *Pseudoergania perkovskiyi*, holotype, ISEA, no. BA2017/7, body, laterally. (d) *Succinostyphlus mroczkowskii*, holotype, EIW, no. 6427, body, dorsally. (e) *Archaeoeugnomus balticus*, holotype, ISEA, no. BA2012/15, body, laterally. (f) *Anthronoeugnomus barsevskisi* **gen. et sp. nov.**, holotype, ISEA, no. BA2017/2, body, laterally. (g,h) *Pachytychius eocenicus*, holotype, ISEA, no. BA2011/7: body, dorso-laterally (g); body, laterally (h). (i) *Mazurieugnomus pilosus* **gen. et sp. nov.**, holotype, ISEA, no. 2016/1, body, laterally. (j,k) *Groehnius parvum* **sp. nov.**, holotype, FEH, no. 649: body, dorso-laterally (j); body, dorsally (k). (l) *Succinostyphlus mroczkowskii*, specimen, ISEA, no. 2012/20, body laterally. (m) *S. mroczkowskii*, GPIH, no. SEBS00292a, body, laterally. Scale bars: 1.0 mm. See Section 2 for names of collections.

**Locality.** Baltic amber.

**Remarks.** Holotype of *Succinostyphlus mroczkowskii* Kuska, 1996 is kept in the EIW and holotype of *Electrotribus erectosquamata* Rheinheimer, 2007 in SMNS. Study of descriptions, images, and comparative material showed that *Electrotribus erectosquamata* **syn. nov.** is synonymous with *Succinostyphlus mroczkowskii*.

Genus *Pachytychius* Jekel, 1861

Type species: *Pachytychius eocenicus* Legalov, 2016

*Pachytychius eocenicus* Legalov, 2016 (Figure 8g,h)

Legalov [45]: 980, Figure 1g therein, plate 5, Figure 4 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

[**Anthonomini** C. G. Thomson, 1859]

**Remarks.** The genus *Anthonomus* Germar, 1817 was recorded from Baltic amber [61].

**Eugnomini** Lacordaire, 1863

**Key to genera of Eugnomini in Baltic amber**

1. Femora without ventral teeth. Scape not reaching the anterior margin of eye.....*Groehnius*  
— Femora with ventral teeth. Scape reaching the anterior margin of eye.....2
2. Apices of eyes are located in same plane with forehead. Antennae inserted beyond middle..... *Anthonoeugnomus* **gen. nov.**  
— Eyes protruding above forehead. Antennae inserted in apical one-third of rostrum.....3
3. Rostrum equal to head and pronotum combined. Tooth on metafemora large. Antennal club simple, oval. Intervals interstriae weakly convex.....*Archaeoeugnomus*  
— Rostrum longer than head and pronotum combined. Tooth on metafemora small. Antennal club attenuate. Intervals interstriae distinctly convex..... *Mazurieugnomus* **gen. nov.**

Genus *Archaeoeugnomus* Legalov, 2016

Type species: *Archaeoeugnomus balticus* Legalov, 2016

*Archaeoeugnomus balticus* Legalov, 2016 (Figure 8e)

Legalov [45]: 981, Figure 1h therein, plate 5, Figure 5 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

Genus *Anthonoeugnomus* **gen. nov.**

urn:lsid:zoobank.org:act:47C24C02-B76A-48D6-BAA4-73E093A85E7A

**Type species:** *Anthonoeugnomus barsevskisi* **sp. nov.**

**Diagnosis.** Body covered with subdecumbent hairs. Rostrum long, curved, longer than head and pronotum combined. Antennal scrobes oblique, directed toward rostrum base. Eyes convex, large. Apices of eyes are located in same plane with forehead. Temples short. Antennae inserted beyond middle of rostrum. Scape reaching eye. Club compact. Pronotum coarsely rugose, punctate. Elytra elongate. Interstriae convex. Precoxal part of prosternum elongate. Ventrites 1 and 2 quite long. Ventrites 3 and 4 quite short. Metafemora with large teeth. Claws free, simple.

**Etymology.** The name is formed from part of the generic name “*Anthonomus*” and generic name “*Eugnomus*”. Gender masculine.

**Comparison.** The new genus differs from the other genera from Baltic amber in the apices of the eyes are located in same plane with the forehead and antennae inserted beyond middle of the rostrum. It differs from *Mazurieugnomus* in the large tooth on the metafemora, weakly convex elytral interstriae, a large pronotum and elytra without long decumbent setae.



***Anthoneugnomus barsevskisi* sp. nov.** (Figure 8f)

urn:lsid:zoobank.org:act:6E3FAFA2-3E77-4759-BAB4-A3155C04C19D

**Description.** Female. **Size.** Body length (without rostrum) 4.1 mm; rostrum length 1.1 mm. **Body** black, covered with quite short pale sparse subdecumbent hairs. **Head.** Rostrum long, distinctly curved, 2.5 times as long as pronotum, longer than head and pronotum combined, 8.3 times as long as wide apically and medially, 6.3 times as long as wide basally, densely punctate. Antennal scrobes oblique, lateral, directed toward rostrum base. Forehead quite narrow, flattened. Eyes distinctly convex and oval, very large. Temples 0.5 times as long as eye. Antennae inserted beyond middle of rostrum. Scape elongate, reaching eye, 11.8 times as long as wide. Antennomeres: 2–8—long, conical; 2—2.3 times as long as wide, 0.2 times as long as and 0.9 times as narrow as scape; 3—2.5 times as long as wide, 0.6 times as long as and 0.6 times as narrow as antennomere 2; 4–6—subequal; 4—2.0 times as long as wide, 0.8 times as long as and equal in width to antennomere 3; 7—1.4 times as long as wide, 0.9 times as long as and 1.3 times as wide as antennomere 6; 8—1.5 times as long as wide, 1.3 times as long as and 1.2 times as wide as antennomere 7. Club compact, 1.7 times as long as wide, 0.6 times as long as funicle. **Pronotum** coarsely rugose, punctate, flattened. **Elytra** elongate, 4.2 times as long as pronotum. Humeri weakly convex. Striae wide and deep. Stria 9 short, fused with stria 10 at level of metacoxae. Interstriae convex, 1.7–2.8 times as wide as striae. **Thorax.** Prothorax punctate. Precoxal part of prosternum elongate, 1.6 times as long as procoxal length. Postcoxal part of prosternum 0.4 times as long as procoxal length. Metaventricle weakly convex, densely punctate, 1.9 times as long as metacoxal length. Metepisternum quite narrow, 3.1 times as long as wide medially, punctate. **Abdomen** convex, punctate. Ventricle 1, 1.4 times as long as metacoxae. Ventricle 2, 1.2 times as long as ventrite 1. Ventrites 3 and 4, equal in length. Ventricle 3, 0.4 times as long as ventrite 2. Ventricle 5, 1.7 times as long as ventrite 4. **Legs** elongate. Procoxae almost conical. Mesocoxae rounded, separated. Metacoxae elongate, shorter than ventrite 1. Femora swollen, punctate, with large teeth. Profemora 3.2 times as long as wide before tooth. Metafemora 3.1 times as long as wide before tooth. Tibiae elongate, almost straight, without mucro and uncus. Metatibiae 8.6 times as long as wide in middle. Tarsi elongate. Tarsomeres: 1—elongate; 2—conical; 3—bilobed; 5—elongate. Claws free, without teeth. Protarsomeres: 1—1.6 times as long as wide; 2—equal in length and width, 0.7 times as long as and 1.1 times as wide as tarsomere 1; 3—0.8 times as long as wide, equal in length and 1.3 times as wide as tarsomere 2; 5—3.3 times as long as wide, 1.3 times as long as and 0.3 times as narrow as tarsomere 3. Metatarsomeres: 1—2.4 times as long as wide; 2—1.3 times as long as wide, 0.7 times as long as and 1.2 times as wide as tarsomere 1; 3—0.7 times as long as wide, equal in length and 1.8 times as wide as tarsomere 2.

**Material examined.** Holotype (ISEA), BA2017/2.

**Etymology.** The epithet of this new species is dedicated to Arvids Barsevskis (Daugavpils) who made a great contribution to the organization of work on the studies of beetles in the Baltic region.

**Locality.** Baltic amber.

**Genus *Mazurieugnomus* gen. nov.**

urn:lsid:zoobank.org:act:2FC1E7B2-C2E0-49C9-9266-0022C4A0683F

**Type species:** *Mazurieugnomus pilosus* sp. nov.

**Diagnosis.** Body covered with long decumbent hairs. Rostrum long, curved, longer than head and pronotum combined. Eyes protruding above forehead. Antennal scrobes oblique, directed toward rostrum base. Forehead quite narrow. Temples quite long. Antennae inserted in apical one-third of rostrum. Club compact, attenuate. Pronotum coarsely punctate. Elytral interstriae distinctly convex. Precoxal part of prosternum long. Ventrites 1 and 3 quite long. Ventrites 3 and 4 shorter. Femora with small teeth. Claws free, without teeth.

**Etymology.** The epithet of this new species is dedicated to Miłosz A. Mazur (Opole University) and generic name “*Eugnomus*”. Gender masculine.

**Comparison.** The new genus differs from the *Archaeoeugnomus* in the rostrum longer than head and pronotum combined, small tooth on the metafemora, attenuate antennal club, and distinctly convex intervals interstriae.

**Mazurieugnomus pilosus sp. nov.** (Figure 8i)

urn:lsid:zoobank.org:act:CEE44BB1-2596-40FD-960D-DC681CB74AB8

**Description.** **Male.** **Size.** Body length (without rostrum) 2.5 mm; rostrum length 1.4 mm. **Body** black, covered with long decumbent hairs. **Head.** Rostrum long, weakly curved, 1.9 times as long as pronotum, longer than head and pronotum combined, 9.4 times as long as wide apically, 6.6 times as long as wide medially, 6.0 times as long as wide basally, punctate. Antennal scrobes oblique, directed toward rostrum base. Forehead quite narrow. Eyes distinctly convex and oval, very large. Temples quite long. Antennae inserted in apical one-third of rostrum. Scape elongate, reaching eye, 15.8 times as long as wide. Antennomeres: 2–8—long, conical; 2—2.7 times as long as wide; 3—2.5 times as long as wide, 0.5 times as long as and 0.5 times as narrow as antennomere 2; 4—1.8 times as long as wide, 0.7 times as long as and equal in width to antennomere 3; 5—1.7 times as long as wide, 0.9 times as long as and 0.9 times as narrow as antennomere 4; 6—1.8 times as long as wide, 0.9 times as long as and 0.8 times as narrow as antennomere 5; 7—subequal to sixth; 8—0.8 times as long as wide, 0.6 times as long as and 1.6 times as wide as antennomere 7. Club compact, 3.8 times as long as wide. **Pronotum** coarsely punctate, flattened. **Elytra** elongate, 3.9 times as long as pronotum. Humeri weakly convex. Striae wide and deep. Stria 9 short, fused with stria 10 at level of metacoxae. Interstriae convex, about 1.7 times as wide as striae. **Thorax.** Prothorax densely punctate. Precoxal part of prosternum 1.5 times as long as procoxal length. Postcoxal part of prosternum 0.4 times as long as procoxal length. Metaventrite convex, densely punctate, 1.7 times as long as metacoxal length. Metepisternum quite narrow. **Abdomen** weakly convex, punctate. Ventrite 1, about 2.3 times as long as metacoxae. Ventrite 2, 0.8 times as long as ventrite 1. Ventrite 3, 0.6 times as long as ventrite 2. Ventrite 4, 0.9 times as long as ventrite 3. Ventrite 5, 1.8 times as long as ventrite 4. **Legs** elongate. Procoxae almost conical. Mesocoxae rounded, separated. Femora swollen, punctate, with teeth. Profemora about 6.5 times as long as wide before tooth. Mesofemora about 5.8 times as long as wide before tooth. Metafemora about 5.1 times as long as wide before tooth, with small tooth. Tibiae elongate, almost straight, without mucro and uncus. Protibiae about 6.1 times as long as wide in middle. Mesotibiae about 8.0 times as long as wide in middle. Metatibiae about 7.3 times as long as wide in middle. Tarsi elongate. Tarsomeres: 1—elongate; 2—conical; 3—bilobed; 5—elongate. Claws free, without teeth. Mesotarsomeres: 1—2.1 times as long as wide; 2—1.3 times as long as wide, 0.8 times as long as and 1.2 times as wide as tarsomere 1; 3—0.7 times as long as wide, 0.8 times as long as and 1.6 times as wide as tarsomere 2; 5—4.7 times as long as wide, 1.4 times as long as and 0.2 times as narrow as tarsomere 3.

**Material examined.** Holotype (ISEA), no. 2016/1.**Etymology.** The epithet of this new species is formed from the Latin “*pilosus*” (hairy).**Locality.** Baltic amber.Genus *Groehnius* Bukejs et Legalov, 2019Type species: *Groehnius electrum* Bukejs et Legalov, 2019**Key to species of genus *Groehnius* in Baltic amber**

1. Large (3.5 mm). Pronotum distinctly narrowed before apex. Rostrum without middle carina. Elytral interstriae much wider than striae..... *G. electrum*  
—Small (1.7 mm). Pronotum slightly narrowed before apex. Rostrum with middle carina. Elytral interstriae slightly wider or equal to the width of striae..... *G. parvum* **sp. nov.**

*Groehnius electrum* Bukejs et Legalov, 2019

Bukejs, Legalov [49]: 46–48, Figures 1 and 2 therein.

**Locality.** Baltic amber.**Remarks.** This species is known only by the holotype (GPIHG).***Groehnius parvum* sp. nov.** (Figure 8j,k)

urn:lsid:zoobank.org:act:7440EE5C-786D-4CAD-9465-A738AABE32FE

**Description.** Male. **Size.** Body length (without rostrum) 1.7 mm; rostrum length 0.4 mm. **Body** black, covered with long decumbent hairs. **Head.** Rostrum long, weakly curved, slightly longer than pronotum, 3.3 times as long as wide apically, 3.8 times as long as wide medially, 2.9 times as long as wide basally, finely punctate, middle carina. Antennal scrobes oblique, directed toward rostrum base. Forehead slightly narrower than rostrum base. Eyes distinctly convex, very large. Temples 0.5 times as long as eye length. Antennae inserted in apical one-fourth of rostrum. Scape elongate, not reaching eye, 9.5 times as long as wide. Antennomeres: 2–8—conical; 2—2.3 times as long as wide, 0.2 times as long as and 0.8 times as narrow as scape; 3—2.5 times as long as wide, 0.7 times as long as and 0.7 times as narrow as antennomere 2; 4—1.5 times as long as wide, 0.6 times as long as and equal in width to antennomere 3; 5—1.2 times as long as wide, equal in length and 1.3 times as wide as antennomere 4; 6—equal in length and width, 0.8 times as long as and equal in width to antennomere 5; 7—1.5 times as long as wide, 1.8 times as long as and 1.2 times as wide as antennomere 6; 8—1.3 times as long as wide, 0.9 times as long as and equal in width to antennomere 7. Club compact, 3.2 times as long as wide, 0.7 times as long as funicle. **Pronotum** slightly narrowed before apex, 0.9 as long as wide apically, 0.8 times as long as wide medially and basally, coarsely punctate, flattened. **Mesonotum.** Scutellum small, almost triangular, longer than wide. **Elytra** elongate, 4.0 times as long as pronotum, 1.8 times as long as wide basally, 1.9 times as long as wide in middle, 2.5 times as long as wide in apical quarter. Humeri weakly convex. Striae wide and deep. Interstriae convex, narrow, 1.0–1.5 times as wide as striae. **Thorax.** Prothorax punctate. Metaventricle weakly convex, punctate. Metepisternum quite narrow. **Abdomen** weakly convex, punctate. Ventrites 1 and 2 long. **Legs** elongate. Procoxae almost conical. Mesocoxae rounded, separated. Femora swollen, punctate, without teeth. Tibiae elongate, almost straight, without mucro and uncus. Tarsi elongate. Tarsomeres: 1—elongate; 2—conical; 3—bilobed; 5—elongate. Claws free, without teeth.

**Material examined.** Holotype (FEH), no. 649.

**Comparison.** The new species differs from *G. electrum* in the smaller body size, pronotum slightly narrowed before apex, rostrum width, middle carina and elytral interstriae slightly wider or equal to the width of striae.

**Etymology.** The epithet of this new species is formed from the Latin “*parvum*” (small).

**Locality.** Baltic amber.

**Rhamphini** Rafinesque, 1815

**Key to subtribe of Rhamphini in Baltic amber**

1. Metafemora nondilated. All femora with large tooth near middle. Scape elongate. Posterior margins of ventrites 2–4 curved weakly posteriad on lateral sides..... Palaeorhamphina
  - Metafemora dilated. All femora without teeth or femora with small teeth. Scape short. Posterior margins of ventrites 2–4 curved distinctly posteriad on lateral sides..... Rhamphina

**Palaeorhamphina** Legalov, 216

Genus *Palaeorhamphus* Legalov, 2016

Type species: *Palaeorhamphus primitivus* Legalov, 2016

**Key to species of genus *Palaeorhamphus* in Baltic amber**

1. Forehead narrow. Rostrum slender..... *P. primitivus*
  - Forehead quite wide. Rostrum more robust..... 2
2. Pronotal punctation finer and sparse. Base of elytra slightly concave..... *P. eichmanni* sp. nov.
  - Pronotal punctation larger and dense. Base of elytra strongly concave..... *P. damzeni* sp. nov.

*Palaeorhamphus damzeni* sp. nov. (Figure 9c,d)

urn:lsid:zoobank.org:act:1CA22E90-E780-4789-8FE3-2784B077B889

**Description.** Female. **Size.** Body length (without rostrum) 2.3 mm. Rostrum length 0.5 mm. **Body** black, covered with long, pale, erect setae. **Head.** Rostrum cylindrical, weakly curved, without

carinae, shorter than pronotum, 3.1 times as long as wide apically, 2.7 times as long as wide medially, 3.1 times as long as wide basally, finely punctate. Antennal scrobes lateral and directed toward rostrum base. Forehead flat, 0.6 times as narrow as rostrum basally, punctate. Eyes rounded, not protruding from margin of head. Vertex weakly convex, densely punctate. Temples distinctly shorter than eye. **Antennae.** Scape elongate, reaching eye. Antennal club compact. **Pronotum** bell-shaped, 1.3 times as long as wide apically, slightly wider than length in middle, 0.9 times as long as wide basally, densely and quite coarsely punctate. Interspaces between punctures slightly smaller than puncture diameter. Sides of pronotum weakly convex in middle. **Mesonotum.** Scutellum 1.3 times as long as wide. **Elytra** wide, convex, 2.0 times as long as pronotum, 1.3 times as long as wide basally, 0.9 times as long as wide in middle, 1.9 times as long as wide in apical quarter. Base of elytra strongly concave. Humeri absent. Elytral striae deep, distinct, and regular, with quite rounded, and dense punctures. Interstriae with 1–3 rows of erect setae, 2.7–3.0 times as wide as striae. **Thorax.** Prothorax coarsely punctate, without postocular lobes. Precoxal part of prosternum 0.3 times as long as procoxae. Metepisternum 4.3 times as long as wide, densely punctate. **Abdomen** densely punctate. Ventrite 1, 1.8 times as long as metacoxae. Ventrite 2, 0.9 times as long as ventrite 1. Posterior margins of ventrites 2–4 curved posteriad on lateral sides. Ventrites 3 and 4, equal in length. Ventrite 3, 0.4 times as long as ventrite 2. Ventrite 5, 2.2 times as long as ventrite 4. **Legs** elongate. Femora punctate, with tooth. Tibiae weakly curved, weakly flattened, and dilated toward apex. Tarsomeres: 1—conical; 2—widely conical; 3—widely bilobed; 5—elongate. Claws large, diverging, with teeth. Mesotarsomeres: 1–1.2 times as long as wide; 2–0.9 times as long as wide, 0.9 times as long as and 1.2 times as wide as tarsomere 1; 3–0.7 times as long as wide, 1.2 times as long as and 1.6 times as wide as tarsomere 2; 5–3.7 times as long as wide, 1.4 times as long as and 0.3 times as narrow as tarsomere 3.

**Material examined.** Holotype (ISEA), no. BA2019/4.

**Comparison.** The new species differs from *P. eichmanni* **sp. nov.** in the large, dense pronotal punctuation and strongly concave elytral base.

**Etymology.** The epithet of this new species is dedicated to Jonas Damzen (Vilnius) who sold this specimen.

**Locality.** Baltic amber.

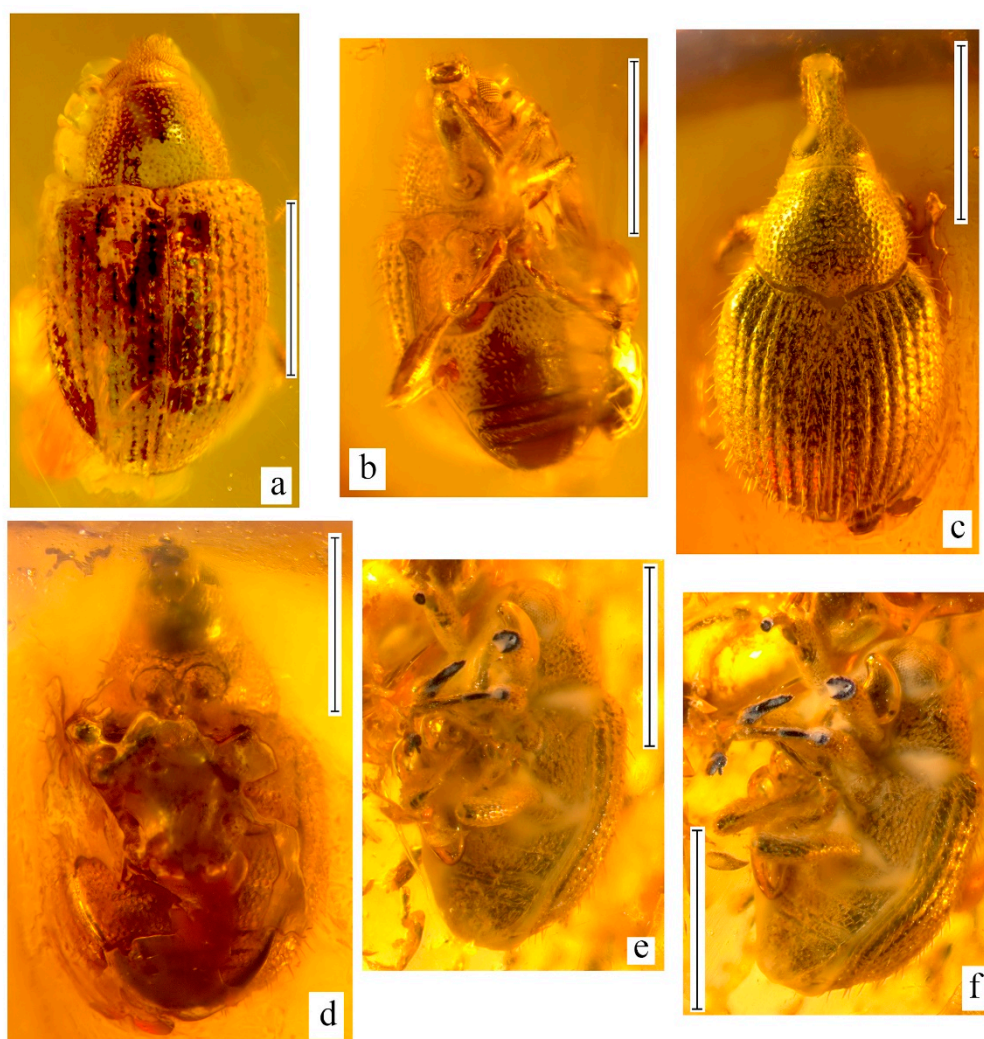
*Palaeorhamphus eichmanni* **sp. nov.** (Figure 9a,b)

urn:lsid:zoobank.org:act:0B9A0D8A-B13A-4666-911C-44B946D8E669

**Description.** Female. **Size.** Body length (without rostrum) 2.5 mm. Rostrum length 0.5 mm. **Body** brown, covered with long, erect setae. **Head.** Rostrum subcylindrical, weakly curved, without carinae, shorter than pronotum, finely punctate. Antennal scrobes lateral and directed toward rostrum base. Forehead flat, narrower than rostrum base, densely punctate. Eyes rounded, weakly protruding from margin of head. Vertex weakly convex, densely punctate. Temples shorter than eye. **Antennae.** Scape elongate, reaching eye. Antennal club compact and elongate. **Pronotum** bell-shaped, 1.2 times as long as wide apically, 0.9 times as long as wide in middle, 0.7 times as long as wide basally, quite finely and sparsely punctate. Interspaces between punctures longer than puncture diameter. Sides of pronotum widened to base. **Mesonotum.** Scutellum 0.8 times as long as wide. **Elytra** wide, convex, 2.6 times as long as pronotum, 1.3 times as long as wide basally and in middle, 2.2 times as long as wide in apical quarter. Base of elytra weakly concave. Humeri smoothed. Elytral striae deep, distinct, and regular. Interstriae with row of erect setae, 2.0–4.0 times as wide as striae. **Thorax.** Prothorax coarsely punctate, without postocular lobes. Precoxal part of prosternum 0.4 times as long as procoxae. Metaventrite 1.2 times as long as metacoxal length. Metepisternum 9.0 times as long as wide, densely punctate. **Abdomen** punctate. Ventrite 1, 1.2 times as long as metacoxae. Ventrite 2, equal to ventrite 1. Posterior margins of ventrites 2–4 curved posteriad on lateral sides. Ventrites 3 and 4, subequal in length. Ventrite 3, 0.5 times as long as ventrite 2. Ventrite 5, 1.5 times as long as ventrite 4. **Legs** elongate. Femora punctate, with tooth. Tibiae weakly curved, weakly flattened, and dilated toward apex. Tarsomeres: 1—conical; 2—widely conical; 3—widely bilobed; 5—elongate. Claws large, diverging, with teeth.

**Material examined.** Holotype (FEH), no. 652.

**Comparison.** The new species differs from *P. damzeni* **sp. nov.** in the finer and sparse pronotal punctation and slightly concave elytral base. It differs from *P. primitivus* in the quite wide forehead and more robust rostrum.



**Figure 9.** Habitus of *Palaeorhamphus* spp. from Baltic amber. (a,b) *P. eichmanni* **sp. nov.**, holotype, FEH, no. 652: body, dorsally (a); body, ventrally (b). (c,d) *P. damzeni* **sp. nov.**, holotype, ISEA, no. BA2019/4: body, dorsally (c); body, ventrally (d). (e,f) *P. primitivus*, holotype, ISEA, no. BA2012/12: body, ventrally (e); body, ventro-laterally (f). Scale bars: 1.0 mm. See Section 2 for names of collections.

**Etymology.** The epithet of this new species is dedicated to Friedhelm Eichmann (Hannover) who provided this specimen for study.

**Locality.** Baltic amber.

*Palaeorhamphus primitivus* Legalov, 2016 (Figure 9e,f)

Legalov [45]: 982–983, Figure 2a therein, plate 5, Figure 6 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA) and paratype (CAGB).

**Rhamphina** Rafinesque, 1815

**Key to genera of Rhamphina in Baltic amber**

1. Flagellum six-segmented. Pronotum with erect setae.....*Tachyerges*
- Flagellum seven-segmented. Pronotum without erect setae.....*Orchestes*

Genus *Orchestes* Illiger, 1798

Type species: *Orchestes signifer* Creutzer, 1799 (= *Curculio avellanae* Donovan, 1797)

*Orchestes tatjanae* Legalov, 2016 (Figure 10a,b)

Legalov [45]: 983–984, Figure 2b therein, plate 5, Figure 7 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

Genus *Tachyerges* Schoenherr, 1825

Type species: *Curculio solicis* Linnaeus, 1758

*Tachyerges hyperoche* Legalov et Poinar, in lit.

Legalov, Poinar [53], *in litteris*.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

[**Mecinini** Gistel, 1856]

**Remarks.** The genus *Mecinus* Germar, 1821 was recorded from Baltic amber [58].

**Tychiini** C.G. Thomson, 1859

Genus *Eocenesibinia* Legalov, 2015

Type species: *Eocenesibinia prussica* Legalov, 2016

*Eocenesibinia prussica* Legalov, 2016 (Figure 10c)

Legalov [45]: 984–985, Figure 2c therein, plate 5, Figure 8 therein.

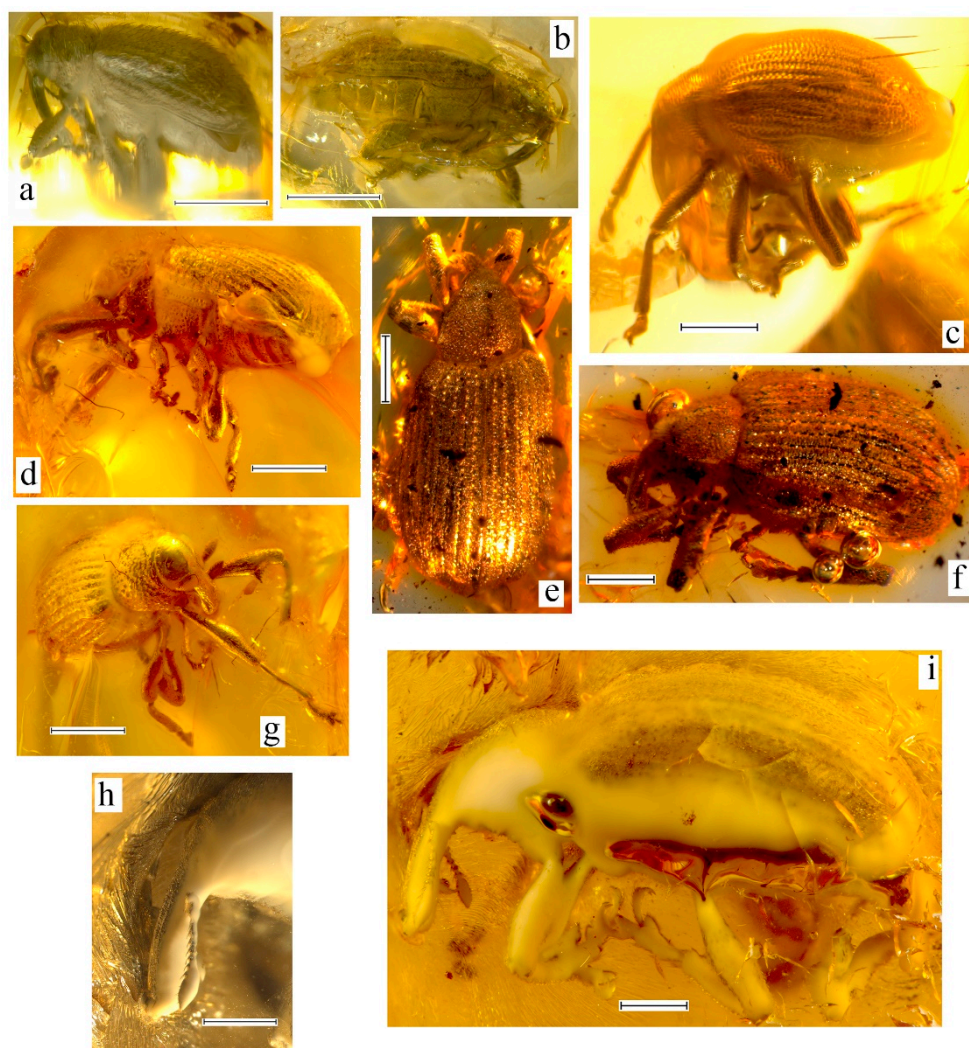
**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

**Camarotini** Schoenherr, 1833

**Remarks.** It is the first record of Camarotini in Baltic amber.





**Figure 10.** Habitus of Curculionidae from Baltic amber. (a,b) *Orchestes tatjanae*, holotype, ISEA, no. BA2014/4: body, laterally, on the left (a); body, laterally, on the right (b). (c) *Eocenesibinia prussica*, holotype, ISEA, no. BA2013/4, body, laterally. (d,g) *Paleodontopus smirnovae* gen. et sp. nov., holotype, KRAM, no. 6504: body, ventro-laterally (d); body, laterally (g). (e,f) *Palaeophelypera kuscheli*, holotype, ISEA, no. BA2012/4: body, dorsally (e); body, laterally (f). (h,i) *Limalophus poinari* sp. nov., holotype, ISEA, no. BA2017/6: rostrum and head, laterally (h); body, laterally (i). Scale bars: 1.0 mm. See Section 2 for names of collections.

**Prionomerina** Lacordaire, 1863

Genus *Paleodontopus* gen. nov.

urn:lsid:zoobank.org:act:8C0A461D-8433-4B9C-8ED4-4A3786E1A0CF

Type species: *Paleodontopus smirnovae* sp. nov.

**Diagnosis.** Body convex, covered with curved setae. Rostrum subcylindrical, distinctly longer than pronotum. Antennal scrobes lateral. Forehead narrow. Eyes not large and not protruding from margin of head. Scape reaching eye. Pronotum and elytra quite wide. Elytral stria 9 full. Pre- and postcoxal parts of prosternum short. Procoxal cavities contiguous. Posterior margins of ventrites 2–4 curved posteriad on lateral sides. Profemora not enlarged, with large serrate tooth. Meso- and metafemora with simple tooth. Claws large, diverging, with teeth.

**Comparison.** The new genus similar to the genus *Odontopus* Say, 1831 but differs in the dentate metafemora, eyes not protruding from a margin of the head, and not enlarged profemora.

**Etymology.** The name of this new genus is formed from the Greek “*palaios*” (ancient) and generic name *Odontopus*. Gender masculine.



**Remarks.** The new genus belongs to Camarotini because its profemora contains a large serrate tooth. Contiguous procoxal cavities and not flattened body indicate its attribution to Prionomerina.

*Paleodontopus smirnovae* sp. nov. (Figure 10d,g)

urn:lsid:zoobank.org:act:553BBDA0-7673-48E4-8D6F-67D23E8C7461

**Description.** Female. **Size.** Body length (without rostrum) 4.0 mm. Rostrum length 1.3 mm. **Body** black, lustrous, covered with long, curved setae. **Head.** Rostrum subcylindrical, weakly curved, without carinae, 1.7 times as long as pronotum, 5.3 times as long as wide apically, 4.9 times as long as wide medially, finely punctate. Antennal scrobes lateral and directed toward rostrum base. Forehead flat, 0.3 times as narrow as rostrum base, punctate. Eyes rounded, not protruding from margin of head. Vertex weakly convex, finely punctate. Temples distinctly shorter than eye. **Antennae.** Scape elongate, reaching eye. Antennal club compact, 2.3 times as long as wide. **Pronotum** bell-shaped, 0.9 times as long as wide apically, 0.7 times as long as wide in middle and basally, coarsely punctate. Interspaces between punctures slightly smaller than puncture diameter. Sides of pronotum weakly convex. **Elytra** wide, convex, 3.4 times as long as pronotum, 1.2 times as long as wide basally, 1.1 times as long as wide in middle. Base of elytra almost straight. Humeri distinct. Elytral striae deep, distinct, and regular. Stria 9 full, not merges with striae 10 near metacoxa. Interstriae with 1–2 rows of curved setae, 2.0–2.7 times as wide as striae. **Thorax.** Prothorax densely punctate, without postocular lobes. Pre- and postcoxal parts of prosternum short. Metaventricle weakly convex, densely punctate, 1.3 times as long as metacoxal length. Metepisternum 6.0 times as long as wide, coarsely punctate. **Abdomen** punctate, weakly flattened. Ventricle 1, 0.8 times as long as metacoxae. Ventricle 2, equal in length to ventrite 1. Posterior margins of ventrites 2–4 curved posteriad on lateral sides. Ventrites 3 and 4, equal in length. Ventricle 3, 0.8 times as long as ventrite 2. Ventricle 5, 1.5 times as long as ventrite 4. **Legs** elongate. Femora clavate. Profemora not enlarged, with large serrate tooth, 3.8 times as long as wide before tooth. Meso- and metafemora with simple tooth. Mesofemora 3.8 times as long as wide before tooth. Metafemora 3.5 times as long as wide before tooth. Tibiae weakly curved, weakly flattened, with uncus. Tarsomeres: 1 and 2—conical; 3—widely bilobed; 5—elongate. Claws large, diverging, with teeth. Protarsomeres: 1—2.6 times as long as wide; 2—equal in length and width, 0.5 times as long as and 1.2 times as wide as tarsomere 1; 3—equal in length and width, 1.7 times as long as and 1.7 times as wide as tarsomere 2; 5—3.0 times as long as wide, 0.9 times as long as and 0.3 times as narrow as tarsomere 3.

**Material examined.** Holotype (KRAM), no. 6504.

**Etymology.** The epithet of this new species is dedicated to Anna V. Smirnova (Kaliningrad Regional Amber Museum), who helped the author in the studies of Baltic amber weevils.

**Locality.** Baltic amber.

### Curculioninae incertae sedis

*Protocleptes hirtus* Nazarenko et Perkovsky, 2016

Nazarenko, Perkovsky [68]: 992, 994–995, Figure 1 therein, plate 7, Figure 1 therein.

**Locality.** Rovno amber.

**Remarks.** Holotype is kept in SIZK.

### Entiminae Schoenherr, 1823

#### Key to tribes of Entiminae in Eocene amber

1. Mandibles without scar of deciduous process.....2
  - Mandibles with scar of deciduous process.....3
2. Mandibles without scales. Rostrum usually long..... Hyperini
  - Mandibles covered with scales. Rostrum short.....[Sitonini]
3. Pronotum with postocular lobes..... 4
  - Pronotum without postocular lobes.....5
4. Mandibles with three long setae, bare. Humeri rounded. Maxillae covered laterally by prementum.....Trachyploeini, part

- Mandibles with more than three long setae, partially covered with scales. Humeri more or less convex. Maxillae exposed.....Eudiagogini
- 5. Rostrum longer, distinctly longer than wide..... Tropiphorini
- Rostrum short, at most slightly longer than wide.....6
- 6. Claws free.....7
- Claws connate at base.....8
- 7. Apex of rostrum with carina forming posterior edge of large epistoma.....Anypotactini
- Posterior border of epistoma indistinct without carina.....Naupactini
- 8. Antennal scrobes dorsally in first half and laterally in second half of rostrum..... Trachyphloeini, part.
- Antennal scrobes laterally..... Polydrusini

### Hyperini Marseul, 1863

#### Key to subtribes of Hyperini in Baltic amber

- 1. Mesepimeron widely trapezoidal. Metepisternum wide, expanded upward and downward. Prementum large..... Cepurina
- Mesepimeron narrowly triangular. Metepisternum narrow, usually extended upward. Prementum small..... [Hyperina]

### Cepurina Capiomont, 1867

Genus *Palaeophelypera* Legalov, 2013

Type species: *Palaeophelypera kuscheli* Legalov, 2013

*Palaeophelypera kuscheli* Legalov, 2013 (Figure 10e,f)

Legalov [41]: 75–76, Figures 27–30 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

### [Hyperina Marseul, 1863]

**Remarks.** The genus similar to *Hypera* Germar, 1817 was recorded from Baltic amber [61].

### [Sitonini Gistel, 1856]

**Remarks.** The genus *Sitona* Germar, 1817 was recorded from Baltic amber [57,58,61].

### Tropiphorini Marseul, 1863

#### Key to genera of Tropiphorini in Baltic amber

- 1. Eyes strongly displaced downward. Elytra about 2.3 times as long as pronotum.....*Scuccinalophus*
- Eyes simple. Elytra 4.0 times as long as pronotum.....*Limalophus*

Genus *Limalophus* Scudder, 1893

Type species: *Limalophus compositus* Scudder, 1893

**Remarks.** It is the first Old-World species of the genus *Limalophus* in Baltic amber.

*Limalophus poinari* sp. nov. (Figure 10h,i)

urn:lsid:zoobank.org:act:9D578D48-EAA9-4375-BABB-84F4B2DEFDE2

**Description. Size.** Body length (without rostrum) 8.1 mm. rostrum length 1.6 mm. Body black, covered with quite narrow appressed scales. **Head.** Rostrum quite long, 1.3 times as long as pronotum, 4.1 times as long as wide in middle, weakly curved, densely punctate, with two longitudinal carinae. Scrobes distinct, lateral, slightly visible dorsally. Forehead quite wide, convex. Eyes small, convex. Vertex weakly flattened, punctate. Mandible massive, with scar. **Antennae** geniculate, inserted at apical third of rostrum laterally, with sparse semierect setae. Scape 6.4 times as long as wide, not reaching eye. Antennomeres: 2–8—conical; 2—1.4 times as long as wide, 0.3

times as long as and 1.3 times as wide as scape; 3—1.3 times as long as wide, 0.6 times as long as and 0.7 times as narrow as antennomere 2; 4—1.1 times as long as wide, equal in length and 1.2 times as wide as antennomere 3; 5—0.9 times as long as wide, 0.8 times as long as and equal to width to antennomere 4; 6—equal in length and width, 1.1 times as long as and equal in width to antennomere 5; 7—0.9 times as long as wide, equal in length and 1.1 times as wide as antennomere 6; 8—0.7 times as long as wide, subequal in length and 1.3 times as wide as antennomere 7. Club compact, 1.8 times as long as wide, 0.5 times as long as funicle, weakly acuminate. **Pronotum** bell-shaped, convex, densely punctate. **Mesonotum**. Scutellum triangular, small. **Elytra** elongate and distinctly convex, 4.0 times as long as pronotum. Humeri distinct. Striae regular and distinct. Interstriae convex, wide, 6.0–7.0 times as wide as width of striae, with dense appressed narrow scales and rarely decumbent scales. **Thorax**. Prosternum densely punctate, without postocular lobes. Precoxal part of prosternum 0.4 times as long as procoxal length. Procoxal cavities round, contiguous. Metaventrite long, 1.5 times as long as metacoxal length. **Abdomen** weakly convex. Ventrites oriented in one plane. Ventrite 1, 1.2 times as long as metacoxa. Ventrite 2, 0.8 times as long as ventrite 1. Ventrite 3, 0.7 times as long as ventrite 2. Ventrite 4, 0.8 times as long as ventrite 3. Ventrite 5, 1.6 times as long as ventrite 4. **Legs** elongate. Femora weakly clavate, without teeth. Profemora length/width ratio 3.0. Mesofemora length/width ratio 3.9. Metafemora length/width ratio 3.1. Tibiae almost straight, weakly flattened, without mucro and uncus. Metatibia length/width ratio 4.1. Tarsi quite long, with pulvilli on underside. Tarsomeres: 1 and 2—conical; 3—bilobed; 5—elongate. Claws large, free, without teeth.

**Material examined.** Holotype (ISEA), no. BA2017/6.

**Comparison.** The new species differs from *L. contractus* Scudder, 1893 from Green River in the longer and narrower rostrum, and larger body sizes.

**Etymology.** The epithet of this new species is dedicated to George Poinar, Jr. (Corvallis) who contributed to the studies of the amber ecosystems.

**Locality.** Baltic amber.

**Remarks.** The new species belongs to Entiminae based on the tibiae lacking an uncus and the massive mandible with a scar. The quite long rostrum, free tarsal claws and lateral antennal scrobes indicate that the new genus belongs to Tropiphorini. Simple eyes and quite short pronotum make it possible to place the new species in the genus *Limalophus*.

Genus *Scuccinalophus* Legalov, 2016

Type species: *Scuccinalophus attenboroughi* Legalov, 2016

*Scuccinalophus attenboroughi* Legalov, 2016 (Figure 11a)

Legalov [44]: 64–66, Figure 6 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (ISEA).

Eudiagogini LeConte, 1874

Genus *Tolstonosik* Legalov, Kirejtshuk et Nel, 2019

Type species: *Tolstonosik oisensis* Legalov, Kirejtshuk et Nel, 2019

*Tolstonosik oisensis* Legalov, Kirejtshuk et Nel, 2019

Legalov et al. [20]: 81–82, Figure 3c,f therein, plate 20, Figures 5 and 6 therein.

**Locality.** Oise amber.

**Remarks.** This species is known only by the holotype (MNHN).

Anypotactini Champion, 1903

Genus *Paonaupactus* Voss, 1953

Type species: *Paonaupactus sitonitoides* Voss, 1953

= *Pareustolus* Voss, 1953

Type species: *Polydrosus scheelei* Voss, 1953

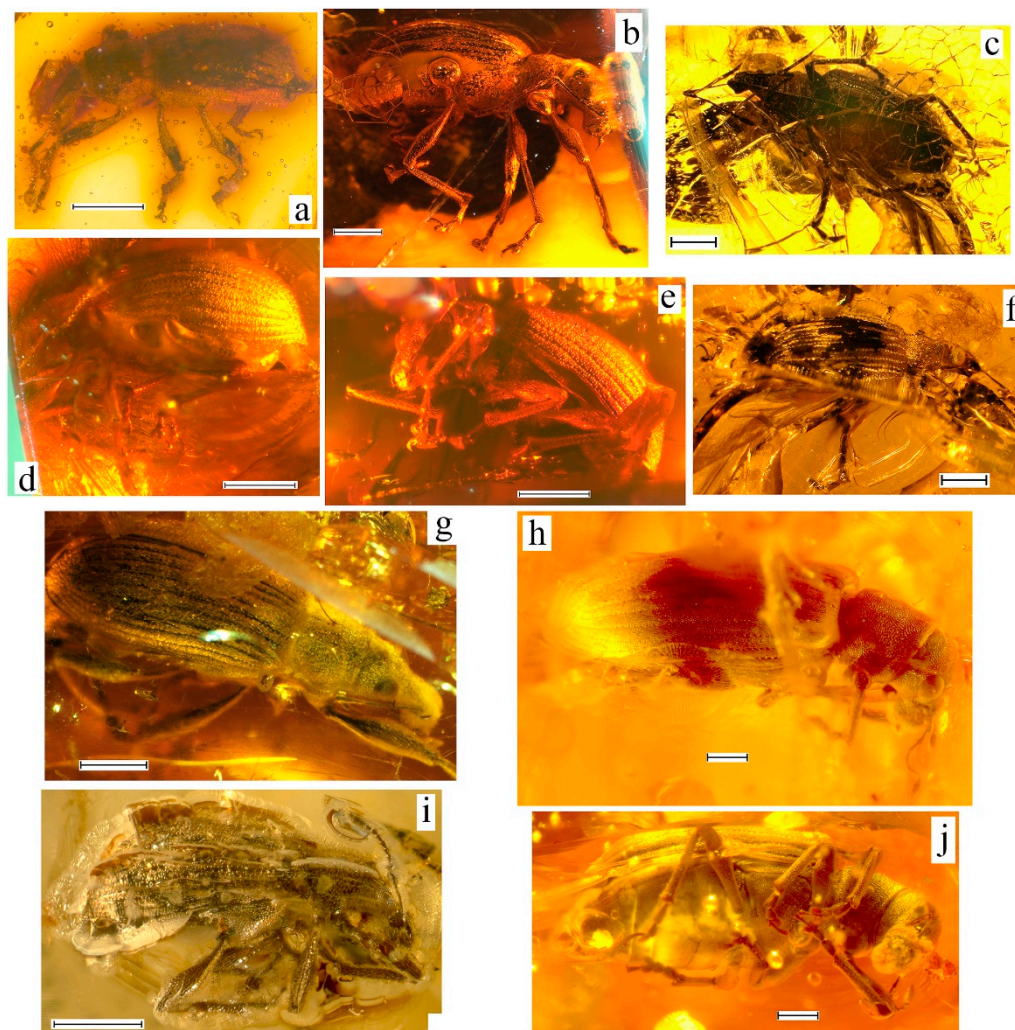
= *Protonaupactus* Zherikhin, 1971, **syn. nov.**

Type species: *Protonaupactus microphthalmus* Zherikhin, 1971

= *Sucinophyllobius* Wanat et Borowiec, 1986

Type species: *Sucinophyllobius viridis* Wanat et Borowiec, 1986

**Remarks.** Small differences in the shape of the antennal club of species give not enough reasons to separate *Protonaupactus* into a separate genus.



**Figure 11.** Habitus of Entiminae from Baltic and Rovno ambers. (a) *Scuccinalophus attenboroughi*, holotype, ISEA, no. BA2015/1, body, laterally. (b) *Polydrosus scheelei*, holotype, GPIH, no. 198, body, laterally. (c) *Paonaupactus sitonitoides*, holotype, GPIH, no. 197, body, ventrally. (d) *Pyllobius cephalotes*, holotype, ZMUC, no. 962, body, laterally. (e) *Otiorhynchus pellucidipes*, holotype, ZMUC, no. 961, body, laterally. (f) *Paonaupactus sitonitoides*, holotype, GPIH, no. 197, dorso-laterally; (g) *P. viridis*, holotype, EIW, no. 5637, body, laterally. (h,j) *Arostropsis gusakovi* sp. nov., holotype, CVGM, no. 032C2014: body, laterally (h); body, latero-ventrally (j). (i) *Paonaupactus katyae*, holotype, MAIG, no. 5981, body, laterally. Scale bars: 1.0 mm. See Section 2 for names of collections.

#### Key species of genus *Paonaupactus* in Eocene amber

1. Scape barely extends beyond posterior margin of eye.....*P. katyae*  
—Scape extends beyond front edge of eye and usually extends beyond front edge of pronotum.....2
2. Club oval. Elytral interstriae with 5–6 oval scales transverse to wide axis and sparse narrower scales.....*P. sitonitoides*

- Club fusiform.....3
- 3. Body covered with appressed hairs without scales..... *P. microphthalmus*
- Body covered with scales..... 4
- 4. Pronotum covered with wide scales.....*P. gracilis*
- Pronotum covered with narrow scales.....5
- 5. Body (without rostrum) larger (5.2–6.2 mm). Apex of metatibiae simple in male..... *P. viridis*
- Body (without rostrum) smaller (4.2–4.5 mm). Metatibiae strongly spatulate apically in male..... *P. sobrinus*

***Paonaupactus gracilis*** Legalov, Nazarenko et Perkovsky, 2019

Legalov et al. [72]: 73, 75, Figures 1f and 2b therein, plate 10.

**Locality.** Rovno amber.

**Remarks.** This species is known only by the holotype (**SIZK**). The length of its body (without rostrum) is 4.2 mm.

***Paonaupactus katyae*** Legalov, Nazarenko and Perkovsky, 2019 (Figure 11i)

Legalov et al. [72]: 70–71, 73, Figures 1e and 2a therein, plate 9.

**Locality.** Rovno amber.

**Remarks.** This species is known only by the holotype (**MAIG**). The length of its body (without rostrum) is 3.6 mm.

***Paonaupactus microphthalmus*** (Zherikhin, 1971)

Zherikhin [26]: 199, 205–206, Figure 3 therein, pl. X, Figure 2 therein (*Protonaupactus*).

**Remarks.** The holotype should be deposited in PIN; however, it was not found there. The length of its body (without rostrum) is 4.0 mm.

***Paonaupactus sitonitoides*** Voss, 1953 (Figure 11b–f)

Voss [24]: 128, Figure 6 therein.

=*Polydrosus scheelei* Voss [24]: 129–130, Figure 8 therein.

=*Pyllobius cephalotes* Voss [25]: 175–176, Figure 6 therein.

=*Otiorhynchus pellucidipes* Voss [25]: 173, Figure 4 therein.

**Locality.** Baltic amber.

**Remarks.** Holotypes of *P. sitonitoides* (Figure 11c,f) and *Polydrosus scheelei* (Figure 11b) are kept in the **GPIH**, and *Pyllobius cephalotes* (Figure 11d) and *Otiorhynchus pellucidipes* (Figure 11e) are kept in the **SZUC**. The length of their body (without rostrum) varies within 3.7–4.8 mm.

***Paonaupactus sobrinus*** (Voss, 1972)

Voss [25]: 174–175, Figures 5 and 12 therein (*Phyllobius*).

**Locality.** Baltic amber.

**Remarks.** Holotype is kept in the **SZUC**. The length of body (without rostrum) is 4.5 mm.

***Paonaupactus viridis*** (Wanat et Borowiec, 1986) (Figure 11g,f)

Wanat, Borowiec [30]: 244–246, Figures 1–3 therein (*Sucinophyllobius*)

**Locality.** Baltic amber.

**Remarks.** Length of body (without rostrum) 5.2–6.2 mm. Holotype is kept in the **EIW** and one specimen (**CVGM**), no. 031C2000 was studied. The length of the body of the mentioned specimens (without rostrum) varies from 5.2 to 6.2 mm.

**Naupactini** Gistel, 1856

Genus ***Arostromopsis*** Yunakov et Kirejtshuk, 2011

Type species: *Arostromopsis groehni* Yunakov et Kirejtshuk, 2011

**Key to species of genus *Arostromopsis* in Eocene amber**

1. Antennomere 2 subequal to antennomere 3. Elytra wider with weaker convex humeral calli. Pronotum wider than long..... *A. perkowskyi*  
 – Antennomere 2 distinctly longer than antennomere 3. Elytra narrower with distinctly convex humeral calli.....2
2. Eyes oval. Pronotum distinctly narrower than long in middle.....*A. groehni*  
 – Eyes rounded. Pronotum subequal in length and width in middle.....*A. gusakovi* **sp. nov.**

*Arostromopsis groehni* Yunakov et Kirejtshuk, 2011

Yunakov, Kirejtshuk [37]: 6–10, Figures 1–16 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known only by the holotype (GPIHG).

*Arostromopsis gusakovi* **sp. nov.** (Figure 11h,j)

urn:lsid:zoobank.org:act:E9215A77-7228-4D07-95BE-CE26E465F9D6

**Description.** Female. **Size.** Body length (without rostrum) 11.5 mm. rostrum length 1.5 mm. Body black–brown, covered with dense rounded green appressed scales. **Head.** Rostrum quite short, 0.7 times as long as pronotum, 1.5 times as long as wide in middle, punctate, with longitudinal line not reaching vertex. Posterior border of epistoma indistinct, without carina. Scrobes laterally. Forehead wide, flattened. Eyes small, rounded, convex. Vertex weakly flattened, densely punctate. Temples longer than eyes. **Antennae** geniculate, inserted behind middle of rostrum. Scape 6.2 times as long as wide, extends beyond front edge of eye. Antennomeres: 2–8—long, conical; 2—3.0 times as long as wide, 0.4 times as long as and 0.9 times as narrow as scape; 3—2.2 times as long as wide, 0.7 times as long as and 0.9 times as narrow as antennomere 2; 5—1.7 times as long as wide; 5–7—equal in width; 6—2.0 times as long as wide, 1.2 times as long antennomere 5; 7—equal to sixth; 8—1.4 times as long as wide, 0.8 times as long as and 1.2 times as wide as antennomere 7. Club compact, 2.5 times as long as wide, weakly acuminate. **Pronotum** bell-shaped, 1.1 times as long as wide apically, subequal in length and width medially, 0.9 times as long as wide basally, weakly flattened, finely and densely punctate. **Mesonotum.** Scutellum triangular, small. **Elytra** elongate and distinctly convex, 3.1 times as long as pronotum, 2.3 times as long as wide at base, 1.8 times as long as wide in middle, 2.5 times as long as wide in apical quarter. Humeri weakly smoothed. Striae regular and distinct. Interstriae flat, wide, 4.3–5.7 times as wide as width of striae. **Thorax.** Prosternum densely punctate, without postocular lobes. Precoxal part of prosternum 0.4 times as long as procoxal length. Procoxal cavities round, contiguous. Postcoxal part of prosternum 0.3 times as long as procoxal length. Metaventricle long, 3.0 times as long as metacoxal length. Metepisternum 6.6 times as long as wide in middle. **Abdomen** weakly convex. Ventrites oriented in one plane. Ventrite 1, 1.4 times as long as metacoxa. Ventrite 2, 1.1 times as long as ventrite 1. Ventrite 3, 0.6 times as long as ventrite 2. Ventrite 4, 0.7 times as long as ventrite 3. Ventrite 5, 2.2 times as long as ventrite 4. **Legs** elongate. Femora weakly clavate, without teeth. Profemora length/width ratio 3.6. Mesofemora length/width ratio 4.1. Metafemora length/width ratio 3.3. Tibiae almost straight, weakly flattened, without mucro and uncus. Metatibial corbels open. Protibia length/width ratio 7.6. Mesotibia length/width ratio 5.6. Metatibia length/width ratio 7.1. Tarsi quite long, with pulvilli on underside. Tarsomeres: 1 and 2—conical; 3—bilobed; 5—elongate. Claws large, free, without teeth. Protarsomeres: 1—1.7 times as long as wide; 2—equal in length and width, 0.7 times as long as and 1.1 times as wide as first; 3—0.6 times as long as wide, equal in length and 1.8 times as wide as second; 5—3.3 times as long as wide, 1.3 times as long as and 0.2 times as narrow as third; mesotarsomeres: 1—1.7 times as long as wide; 2—equal in length and width, 0.6 times as long as and 1.1 times as wide as tarsomere 1; 3—0.6 times as long as wide, equal in length and 1.6 times as wide as tarsomere 2; 5—5.0 times as long as wide, 1.9 times as long as and 0.2 times as narrow as tarsomere 3; metatarsomeres: 1—1.5 times as long as wide; 2—1.3 times as long as wide, 0.8 times as long as and equal in width to tarsomere 1; 3—0.6 times as long as wide, 0.8 times as long as and 1.6 times as wide as tarsomere 2; 5—5.0 times as long as wide, 1.9 times as long as and 0.2 times as narrow as tarsomere 3.

**Material examined.** Holotype (CVGM), no. 032C2014.

**Comparison.** The new species differs from *A. groehni* in the rounded eyes, pronotum with subequal length and width in middle and larger body sizes.

**Etymology.** The epithet of this new species is dedicated to Viktor A. Gusakov (Moscow).

**Locality.** Baltic amber.

*Arostromsis perkovskyi* Bukejs et Legalov, 2019

Bukejs, Legalov [71]: 26, Figures 1 and 2 therein.

**Locality.** Rovno amber.

**Remarks.** This species is known only by the holotype (GPIHG).

**Polydrusini** Schoenherr, 1823

Genus *Polydrusus* Germar, 1817

Type species: *Curculio undatus* Fabricius, 1781 (= *Curculio tereticollis* DeGeer, 1775)

Subgenus *Palaeodrosus* Zherikhin, 1971

Type species: *Polydrusus archetypus* Zherikhin, 1971

### Key to species of subgenus *Palaeodrosus* in Baltic amber

1. Elytra narrower. Pronotum and elytra covered with narrow scales. Eyes slightly convex..... *P. (P.) archetypus*  
 — Elytra wider. Pronotum covered with wide scales. Elytra covered with two types of scales: narrow erect and wide semierect. Eyes more convex..... *P. (P.) zherikhini* **sp. nov.**

*Polydrusus (Palaeodrosus) archetypus* Zherikhin, 1971

Zherikhin [26]: 206–207, Figure 4 therein.

**Locality.** Baltic amber.

**Remarks.** The holotype of this species should be deposited in PIN; however, at the moment, it is missing there.

*Polydrusus (Palaeodrosus) zherikhini* **sp. nov.** (Figure 12a,b)

urn:lsid:zoobank.org:act:FB4E96D8-3069-4D91-86E1-C8950252441D

**Description.** Female. **Size.** Body length (without rostrum) 2.9 mm. rostrum length 0.4 mm. Body black, covered with sparse narrow and wide scales. **Head.** Rostrum quite short, 0.7 times as long as pronotum, 0.9 times as long as wide in middle, 0.8 times as long at base, punctate. Scrobes lateral. Forehead wide, flattened, punctate. Eyes large, rounded, convex. Vertex weakly flattened. Temples 0.5 times as long as eyes. **Antennae** geniculate, inserted behind middle of rostrum. Scape 6.7 times as long as wide, not reaching pronotum. Antennomeres: 2–8—conical; 2—1.7 times as long as wide, 0.3 times as long as and subequal in width to scape; 3—2.0 times as long as wide, 0.6 times as long as and 0.5 times as narrow as antennomere 2; 4—1.4 times as long as wide, 0.8 times as long as and 1.2 times as wide as antennomere 3; 5—equal to antennomere 4. Club compact, quite long, weakly acuminate. **Pronotum** bell-shaped, 0.9 times as long as wide apically, 0.6 times as long as wide medially, 0.7 times as long as wide basally, weakly flattened, densely punctate, covered with wide scales. Sides weakly rounded. **Mesonotum.** Scutellum suboval, small. **Elytra** convex, quite wide, 3.7 times as long as pronotum, 1.7 times as long as wide at base, 1.5 times as long as wide in middle, 2.6 times as long as wide in apical quarter. Humeri weakly smoothed. Striae regular and distinct. Interstriae flat, wide, 1.5–2.0 times as wide as width of striae, with narrow erect, and semierect wide scales. **Thorax.** Prosternum punctate, without postocular lobes. Pre- and postcoxal parts of prosternum short. Procoxal cavities round, contiguous. Metaventricle equal in length to metacoxal length. Metepisternum 5.1 times as long as wide in middle. **Abdomen** convex. Ventricle 1, 1.4 times as long as metacoxa. Ventricle 2, 1.1 times as long as ventrite 1. Ventricle 3, 0.4 times as long as ventrite 2. Ventricle 4, 0.8 times as long as ventrite 3. Ventricle 5, 2.8 times as long as ventrite 4. **Legs** elongate. Femora weakly clavate, without teeth. Tibiae almost straight, weakly flattened, without



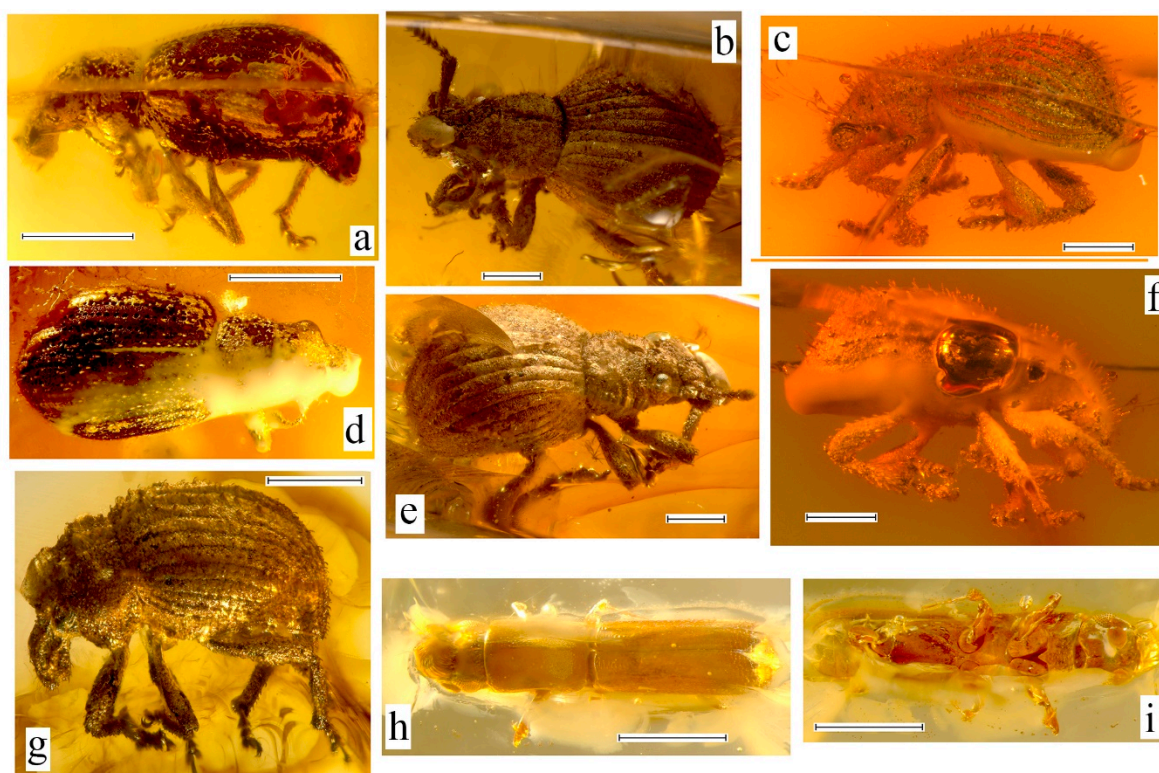
mucro and uncus. Metatibial corbels open. Tarsi quite long, with pulvilli on underside. Tarsomeres: 1 and 2—conical; 3—bilobed; 5—elongate. Claws large, fused at base, without teeth.

**Material examined.** Holotype (ISEA), BA2015/14.

**Comparison.** The new species differs from *P. (P.) archetypus* Zherikhin, 1971 in the wider elytra, pronotum covered with wide scales, elytra with narrow erect, and semierect wide scales and also in the more convex eyes.

**Etymology.** The epithet of this new species is dedicated to the paleoentomologist Vladimir V. Zherikhin.

**Locality.** Baltic amber.



**Figure 12.** Habitus of Entiminae and Platypodidae from Baltic amber. (a) *Polydrusus zherikhini* sp. nov., holotype, ISEA, BA2015/14, body, laterally. (b,e) *Archaeocallirhopalus larssoni*, holotype, ISEA, no. BA2012/1: body, dorsally (b); body, laterally (e). (c,f) *Archaeosciaphilus marshalli*, holotype, EIW, no. 7975: body, laterally, on the left (c); body, laterally, on the right (f). (d) *Polydrusus zherikhini* sp. nov., holotype, ISEA, BA2015/14, body, laterally. (g) *Archaeocallirhopalus alekseevi*, paratype, ISEA, no. BA2012/13, body, laterally. (h,i) *Cenocephalus aniskini* sp. nov., holotype, ISEA, no. BA2018/3: body, dorsally (h); body, ventrally (i). Scale bars: 1.0 mm. See Section 2 for names of collections.

Genus *Archaeosciaphilus* Legalov, 2012

Type species: *Archaeosciaphilus marshalli* Legalov, 2012

**Remarks.** This genus was placed in Sciaphilini Sharp, 1891. The study of an undescribed species of the genus with clearly visible characters showed that it is characterized by mandibles with five long setae and maxillae exposed at the sides of the prementum, making it possible to transfer it to Polydrusini [Legalov, Poinar, in preparation].

*Archaeosciaphilus marshalli* Legalov, 2012 (Figure 12c,f)  
Legalov [39]: 271, Figure 2d therein, pl. 9, Figure 2 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (EIW).

*Trachyploeini* Lacordaire, 1863

[*Trachyphloeina* Lacordaire, 1863]

**Remarks.** The genus *Trachyphloeus* Germar, 1817 was recorded from Baltic amber [61].

**Pseudocneorrhina** Kono, 1930

Genus *Archaeocallirhopalus* Legalov, 2013

Type species: *Archaeocallirhopalus larssoni* Legalov, 2013

**Key species of genus *Archaeocallirhopalus* in Baltic amber**

1. Body (without rostrum) larger (5.1 mm). Forehead with strong tubercles over eyes. Scape 4.1 times as long as wide..... *A. larssoni*

— Body (without rostrum) smaller (3.3 mm). Forehead without strong tubercles over eyes. Scape 3.7 times as long as wide..... *A. alekseevi*

*Archaeocallirhopalus alekseevi* Legalov et Bukejs, 2015 (Figure 12g)

Legalov, Bukejs [43]: 25–28, Figures 1–5 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype (ABCD) and the paratype (ISEA).

*Archaeocallirhopalus larssoni* Legalov, 2013 (Figure 12b,e)

Legalov [41]: 77–78, Figures 31–34 therein.

**Locality.** Baltic amber.

**Remarks.** The holotype is kept in ISEA.

**Curculionidae incertae sedis**

Genus *Thryogenosoma* Voss, 1953

=*Eirrhinoides* Motschulsky, 1857 non Blanchard, 1849

Type species: *Eirrhinoides cariniger* Motschulsky, 1857

*Thryogenosoma cariniger* (Motschulsky, 1857)

Motschulsky [22]: 27 (*Eirrhinoides*).

**Locality.** Baltic amber.

**Remarks.** The beetle was deposited in the Danziger Naturkundemuseum Menge collection which was lost during the Second World War.

**Platypodidae** Shuckard, 1839

**Tesserocerinae** Strohmeier, 1914

**Tesserocerini** Strohmeier, 1914

**Key to genera of Tesserocerini in Baltic amber**

1. Mesonotum without longitudinal carina. Antennal club wider than long..... *Eoplatypus*

— Mesonotum with longitudinal carina. Antennal club longer than wide..... *Cenocephalus*

Genus *Eoplatypus* Cognato et Smith, 2019

Type species: *Eoplatypus jordali* Peris, Solórzano Kraemer et Cognato, 2017

*Eoplatypus jordali* Peris, Solórzano Kraemer et Cognato, 2017

Peris et al. [93]: 191, Figure 4 therein.

**Locality.** Baltic amber.

**Remarks.** The species is known by the holotype and paratype from SFNF [93].

Genus *Cenocephalus* Chapuis, 1865

Type species: *Cenocephalus thoracicus* Chapuis, 1865

**Remarks.** This find is the first record of the genus in Baltic amber.

*Cenocephalus aniskini* sp. nov. (Figure 12h,i)

urn:lsid:zoobank.org:act:4B9EDF95-BCCD-4F3A-BF1E-DA4E4550A9F9

**Description.** **Description.** Female. **Size.** Body length (without rostrum) 3.2 mm. **Body** yellow–brown, naked. **Head.** Head subequal in width to pronotum, ventrally with pregular sutures. Forehead wide, weakly concave, with abundant, long, erect setae. Eyes large, weakly convex, rounded, coarsely faceted. Temples much shorter than eye. Rostral pleurostomal sinus shallow. Maxilla with mesal clement clearly divided into separate lacinia and galea. Scape elongate, reaching second third of eye, 3.8 times as long as wide. Antennomeres: 2–5—wide, conical; 2—0.7 times as long as wide, 0.01 times as long as and 0.5 times as narrow as scape; 3—0.6 times as long as wide, 1.5 times as long as and 1.7 times as wide as antennomere 2; 4—0.3 times as long as wide, 0.7 times as long as and 1.1 times as wide as antennomere 3; 5—about 0.3 times as long as wide, equal in length and 1.1 times as wide as fourth. Club compact, flat, 1.5 times as long as wide, 2.5 times as long as funicle, without sutures between segments of club. **Pronotum** subcylindrical, 1.4 times as long as wide apically, 1.3 times as long as wide medially and 1.4 times as long as wide basally, finely punctate, weakly convex. Sides straight, parallel. Disc with minute punctures. Posterior one-third of pronotum with transverse band of numerous, small, closely placed mycetangia pores. **Mesonotum** with longitudinal carina. Scutellum almost triangular, small, located below surface of elytra. **Elytra** elongate, 1.8 times as long as pronotum, 2.6 times as long as wide basally, 2.4 times as long as wide in middle, 2.5 times as long as wide in apical quarter. Elytral base carinate. Humeri smoothed. Striae weak. Interstriae flat, wide, 4.0–5.0 times as wide as striae. Elytral declivity commencing in apical fourth, slightly concave, with erect setae, without tubercles. Border of declivity armed with two distinct long spines on interstria 3. **Thorax.** Prothorax finely punctate. Posterior margin of prothorax strongly procurved in pleural area. Femoral grooves distinct. Precoxal part of prosternum 0.7 times as long as length of procoxa. Procoxal cavities contiguous. Metaventricle flat, finely punctate, 3.9 times as long as metacoxal length. Metepisternum quite wide, 3.7 times as long as wide in middle. **Abdomen** weakly convex. Ventricle 1, 0.4 times as long as metacoxal length. Ventricle 2, equal in length to ventrite 1. Ventricle 3, 2.2 times as long as ventrite 2. Ventricle 4, 1.2 times as long as ventrite 3. Ventricle 5, equal in length to ventrite 4. **Legs** elongate. Procoxae enlarged. Mesocoxae rounded, widely separated. Femora laterally compressed, wide. Metafemora 2.2 times as long as wide in middle. Tibiae curved, with three lateral ridges or rugae on outer surfaces, with mucro. Metatibia 2.7 times as long as wide in middle. Tarsi elongate. Tarsomeres: 1—long, longer than tarsomeres 2–5 combined; 2 and 3—long, conical; 4—slightly longer than wide; 5—elongate. Claws free and long.

**Material examined.** Holotype (ISEA), no. BA2018/3.

**Comparison.** The new species differs from other species of the genus in the border of the elytral declivity armed with two, distinct, long spines on the interstria 3 and slightly concave unarmed elytral declivity.

**Etymology.** The epithet of this new species is dedicated to Dr. V. M. Aniskin (Khristianovich Institute of Theoretical and Applied Mechanics, SB RAS, Novosibirsk) who helped the author with the study.

**Locality.** Baltic amber.

**Remarks.** The new species belongs to Tesserocerinae because the maxilla with mesal element is clearly divided into separate lacinia and galea. Contiguous procoxal cavities give a reason to put this new species in tribe Tesserocerini. Mesonotum with longitudinal carina, antennal club longer than wide and rounded eyes make it possible to place it in the genus *Cenocephalus*.

Spectra of laser-induced fluorescence (LIF) were investigated to confirm the belonging of this amber sample.

**Scolytidae** Latreille, 1804

**Key subfamilies of Scolytidae in Eocene amber**

1. Head visible dorsally. Anterior margins of elytra procurved and with rows of crenulations.....Hylesininae
  - Head concealed dorsally by pronotum. Anterior margins of elytra forming straight line, unarmed.....Scolytinae

**Hylesininae** Erichson, 1836**Key to tribes of Hylesininae in Eocene amber**

1. Precoxal portion of prosternum strongly elevated.....Hylastini  
—Precoxal portion of prosternum not elevated..... 2
2. Eyes simple, not emarginate..... Hylurgini  
—Eyes distinctly emarginate.....3
3. Antennal club symmetrical, sutures transverse..... Polygraphini  
—Antennal club with three oblique sutures..... Phloeosinini

**Hylastini** LeConte, 1876Genus *Hylastes* Erichson, 1836Type species: *Bostrichus ater* Paykull, 1800*Hylastes aterites* Schedl, 1947

Schedl [23]: 21–22.

**Locality.** Baltic amber.

**Remarks.** This species is known by two syntypes [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

Genus *Hylurgops* LeConte, 1876Type species: *Hylastes pinifex* Fitch, 1858 (= *Hylastes rugipennis* Mannerheim, 1843)= *Hylesinites* Germar, 1813Type species: *Hylesinites electrinus* Germar, 1813= *Hylastites* Hagedorn, 1906Type species: *Hylastites schellwieni* Hagedorn, 1906= *Myelophilites* Hagedorn, 1907Type species: *Myelophilites dubius* Hagedorn, 1906= *Hylescierites* Schedl, 1947Type species: *Hylescierites granulatus* Schedl, 1947

**Remarks.** The key to species is based on the key from Schedl [23]. *H. electrinus* and *H. schellwieni* are not included in the key because it requires a study of the types.

**Key species of genus Hylurgops in Baltic amber**

1. Procoxal cavities distinctly separated. Body smaller (2.4 mm)..... *H. granulatus*  
—Procoxal cavities almost contiguous. Body larger (2.9–3.5 mm).....2
2. Body smaller (2.9 mm)..... *H. dubius*  
—Body larger (3.2–3.5 mm).....3
3. Body very slender. Pronotum distinctly narrowed to apex..... *H. pilosellus*  
—Body stumpy, more cylindrical. Pronotum weakly narrowed to apex.....4
4. Elytral declivity punctate..... *H. corpulentus*  
—Elytral declivity with granules. Each granule with long setae..... *H. tuberculatus*

**Hylurgops corpulentus** Schedl, 1947

Schedl [23]: 23, 27–28, Figures 10 and 11 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by a series of syntypes [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

**Hylurgops dubius** (Hagedorn, 1906)Hagedorn [84]: 118 (*Myelophilites*).**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype and a specimen [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

***Hylurgops electrinus*** (Germar, 1813)Germar [21]: 15 (*Hylesinites*).**Locality.** Baltic amber.**Remarks.** The holotype is kept in the **MLUH**. Description without any information about reposition of the specimen examined.***Hylurgops granulatus*** (Schedl, 1947)Schedl [23]: 30, Figure 12 therein (*Hylescierites*).**Locality.** Baltic amber.**Remarks.** This species is known by the holotype [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.***Hylurgops pilosellus*** Schedl, 1947

Schedl [23]: 23, 26–27, Figure 9 therein.

**Locality.** Baltic amber.**Remarks.** This species is known by a series of syntypes [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.***Hylurgops schellwieni*** (Hagedorn, 1906)Hagedorn [94]: 117 (*Hylastites*).**Locality.** Baltic amber.**Remarks.** The holotype was lost [23].***Hylurgops tuberculatus*** Schedl, 1947

Schedl [23]: 23, 28–29.

**Locality.** Baltic amber.**Remarks.** This species is known by a series of syntypes [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.**Hylurgini** Gistel, 1848**Key to genera of Hylurgini in Eocene amber**

1. Procoxae very narrowly separated..... *Xylechinites*
- Procoxae widely separated..... 2
2. Club conical, with two transverse sutures. Its apical segment pointed..... *Xylechinus*
- Club flattened, wide, with three distinctly transverse sutures. Its apical segment rounded..... *Klesovia*

**Genus *Xylechinus*** Chapuis, 1869Type species: *Hylesinus pilosus* Ratzeburg, 1837***Xylechinus mozolevskae*** Petrov et Perkovsky, 2008

Petrov, Perkovsky [65]: 407, Figure 1 therein.

**Locality.** Rovno amber.**Remarks.** This species is known by the holotype in **SIZK** [65].**Genus *Klesovia*** Petrov et Perkovsky, 2018Type species: *Klesovia pubescens* Petrov et Perkovsky, 2018***Klesovia pubescens*** Petrov et Perkovsky, 2018

Petrov, Perkovsky [69]: 167, Figure 1 therein, plate 7, Figures 1 and 2 therein.

**Locality.** Rovno amber.**Remarks.** This species is known by the holotype and several paratypes in **SIZK** [69].**Genus *Xylechinites*** Hagedorn, 1906

Type species: *Xylechinites anceps* Hagedorn, 1906

*Xylechinites anceps* Hagedorn, 1906

Hagedorn [94]: 120, Figures 10–12 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

**Phloeosinini** Nuesslin, 1912

Genus *Phloeosinus* Chapuis, 1869

Type species: *Hylesinus thujae* Perris, 1855

= *Phloeosinites* Hagedorn, 1906

Type species: *Phloeosinites rehi* Hagedorn, 1906

**Remarks.** The key to species is based on the key from Schedl [23]. *Ph. rehi* is not included in the key, because its differences from other species need to be clarified.

#### Key species of genus *Phloeosinus* in Baltic amber

1. Elytral declivity without granules or teeth..... *Ph. wolffi*  
— Elytral declivity with granules or teeth.....2
2. Elytral declivity with large teeth..... *Ph. sexspinosus*  
— Elytral declivity with rows of granules on first and third interstriae.....3
3. Body slender, cylindrical..... *Ph. robustus*  
— Body stumpy, oval.....4
4. Elytral striae weakly visible. Elytral interstriae densely irregular punctate and with two weak, irregular rows of points.....5  
— Elytral striae distinct. Elytral interstriae only with two weak, irregular rows of points.....6
5. Elytral declivity oblique and weakly convex, with very small granules..... *Ph. tuberculifer*  
— Elytral declivity distinctly convex, with distinct rows of granules..... *Ph. assimilis*
6. Interstriae of elytral declivity narrow, with sparse, quite large granules..... *Ph. brunni*  
— Interstriae of elytral declivity wide, with dense, small granules..... *Ph. regimontanus*

*Phloeosinus assimilis* (Schedl, 1947)

Schedl [23]: 34, 37–38 (*Phloeosinites*).

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

*Phloeosinus brunni* (Hagedorn, 1906)

Hagedorn [94]: 119, Figures 7 and 8 therein (*Phloeosinites*).

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype and a specimen [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

*Phloeosinus regimontanus* (Hagedorn, 1906)

Hagedorn [94]: 119–120, Figure 9 therein (*Phloeosinites*).

**Locality.** Baltic amber.

**Remarks.** This species is known by a series of syntypes [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

*Phloeosinus rehi* (Hagedorn, 1906)

Hagedorn [94]: 118 (*Phloeosinites*).

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype [94], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

*Phloeosinus robustus* (Schedl, 1947)

Schedl [23]: 34, 36–37 (*Phloeosinites*).

**Locality.** Baltic amber.

**Remarks.** This species is known by a series of syntypes [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

*Phloeosinus sexspinosus* (Schedl, 1947)

Schedl [23]: 34–36 (*Phloeosinites*).

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

*Phloeosinus tuberculifer* (Schedl, 1947)

Schedl [23]: 34, 37 (*Phloeosinites*).

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

*Phloeosinus wolffi* (Schedl, 1947)

Schedl [23]: 35, 40–41, Figure 16 therein (*Phloeosinites*).

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

**Polygraphini** Chapuis, 1869

Genus *Carphoborus* Eichhoff, 1864

Type species: *Hylesinus minimus* Fabricius, 1801

=*Carphoborites* Carpenter, 1992

Type species: *Charphoborites keilbachi* Schedl, 1947

#### Key to species of genus *Carphoborus* in Baltic amber

1. Forehead convex. Body slender..... *C. keilbachi*  
— Forehead flat. Body stumpy..... *C. posticus*

*Carphoborus keilbachi* (Schedl, 1947)

Schedl [23]: 32–33 (*Carphoborites*).

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

*Carphoborus posticus* (Schedl, 1947)

Schedl [23]: 33 (*Carphoborites*).

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

**Scolytinae** Latreille, 1804

**Dryocoetini** Lindemann, 1877

#### Key to genera of Dryocoetini in Eocene amber

1. Pronotum evenly convex..... *Taphramites*



—Pronotum strongly convex in middle, flattened basally..... *Taphrorychus*

Genus *Taphramites* Schedl, 1947

Type species: *Taphramites gnathotrichus* Schedl, 1947

#### Key to species of genus *Taphramites* in Eocene amber

1. Elytral declivity with long, dense, thick setae..... *T. gnathotrichus*
- Elytral declivity with short, slender setae..... *T. rovnoensis*

*Taphramites gnathotrichus* Schedl, 1947

Schedl [23]: 42.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War. This is a common species in Baltic amber [65].

*Taphramites rovnoensis* Petrov et Perkovsky, 2008

Petrov, Perkovsky [65]: 408, Figures 2–4 therein.

**Locality.** Rovno amber.

**Remarks.** This species is known by the holotype and paratypes in **SIZK** [65].

Genus *Taphrorychus* Eichhoff, 1878

Type species: *Bostrichus bicolor* Herbst, 1793

*Taphrorychus immaturatus* Schedl, 1947

Schedl [23]: 17, 43, 44, Figure 17 therein.

**Locality.** Baltic amber.

**Remarks.** This species is known by the holotype [23], which should be deposited in the collection of the Albertus-Universität Königsberg and which was lost during the Second World War.

## 4. Discussion

In total, 142 species of Curculionoidea [2,3,84–88] are recognized in this review, including nine species of Belidae, 10 species of Rhynchitidae, 13 species of Brentidae, 70 species of Curculionidae, two species of Platypodidae, and 24 species of Scolytidae (Table 1; Figure 13). Oise amber has eight species, Baltic amber has 118 species, and Rovno amber has 16 species.

**Table 1.** List of Curculionoidea from Eocene ambers. BalJ—Baltic amber, OisJ—Oise amber, and RovJ—Rovno amber.

Family	Subfamily	Tribe	Genus	Species	Locality
Nemonychidae	Cimberidinae	Kuschelomacerini	<i>Kuschelomacer</i> Riedel, 2010	<i>K. kerneggeri</i> Riedel, 2010	BalJ
Anthribidae	Anthribinae	Oiserhinini	<i>Oiserhinus</i> Legalov, Kirejtshuk et Nel, 2019	<i>O. insolitus</i> Legalov, Kirejtshuk et Nel, 2019	OisJ
			<i>Pseudomecocer</i> <b>gen. nov.</b>	<i>P. alekseevi</i> <b>sp. nov.</b>	BalJ
		Mecocerini	<i>Pseudomecocer</i> Voss, 1953	<i>P. orlovi</i> Zherikhin, 1971	BalJ
				<i>P. simulator</i> Voss, 1953	BalJ
		Allandrini	<i>Allandroides</i> Legalov, 2015	<i>A. vossi</i> Legalov, 2015	BalJ
			<i>Glaesotropis</i> Gratshev et Zherikhin, 1995	<i>G. balticus</i> <b>sp. nov.</b>	BalJ
		Zygaenodini		<i>G. martynovi</i> Legalov, 2012), <b>comb. nov.</b>	BalJ
				<i>G. diadysasashai</i> Gratshev et Perkovsky, 2008	RovJ
				<i>G. gusakovi</i> Legalov, 2015	BalJ
				<i>G. minor</i> Gratshev et Zherikhin, 1995	BalJ
				<i>G. succiniferus</i> Legalov,	BalJ

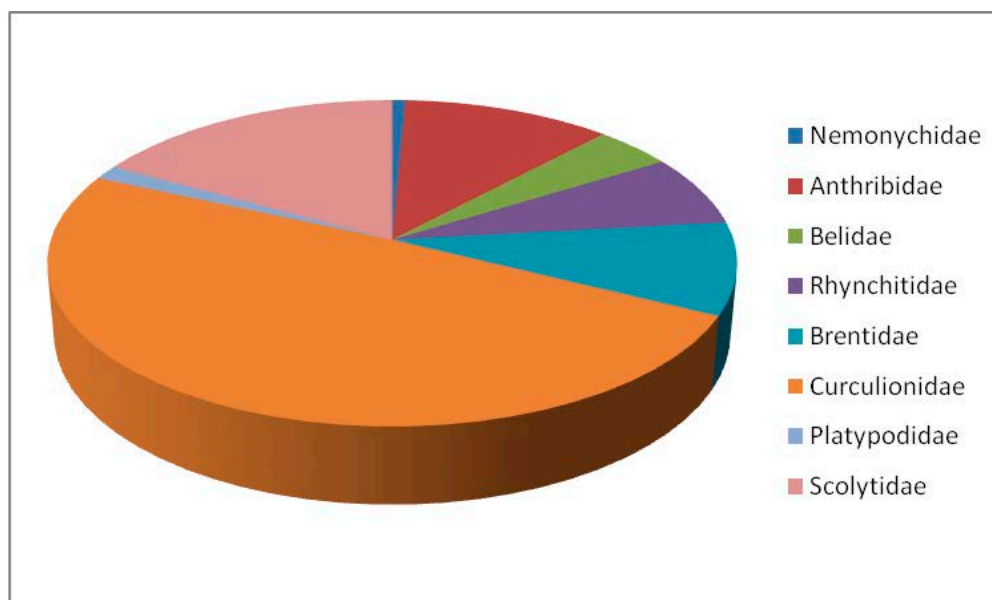
			2015		
			<i>G. weitschati</i> Gratshev et Zherikhin, 1995	BalJ	
			<i>G. allenii</i> Legalov, 2015	BalJ	
			<i>G. gratshevi</i> Legalov, 2015	BalJ	
			<i>G. zherikhini</i> (Legalov, 2013)	BalJ	
	Choraginae	Valenfriesiini	<i>Eduardoxenus</i> Legalov, Nazarenko et Perkovsky, 2018	<i>E. unicus</i> Legalov, Nazarenko et Perkovsky, 2018	RovJ
Belidae	Oxycoryninae	Oxycraspedini	<i>Oxycraspedus</i> Kuschel, 1955	<i>O. poinari</i> Legalov, 2016	BalJ
		Metrioxenini	<i>Archimetroxena</i> Voss, 1953	<i>A. electrica</i> Voss, 1953	BalJ
			= <i>Palaeometrioxena</i> Legalov, 2012, <b>syn. nov.</b>	<i>A. zherikhini</i> (Legalov, 2012), <b>comb. nov.</b>	BalJ
			<i>Succinometrioxena</i> Legalov, 2012	<i>S. attenuata</i> Legalov et Poinar, in lit.	BalJ
				<i>S. bachofeni</i> Legalov, 2013	BalJ
				<i>S. poinari</i> Legalov, 2012	BalJ
Rhynchitidae	Sayrevilleinae	Sanyrevilleini	<i>Baltocar</i> Kuschel, 1992	<i>B. convexus</i> Legalov, 2015	BalJ
				<i>B. groehni</i> Riedel, 2012	BalJ
				<i>B. hoffeinsorum</i> Riedel, 2012	BalJ
				<i>B. subnudus</i> Riedel, 2012	BalJ
				<i>B. succinicus</i> (Voss, 1953)	BalJ
	Rhynchitinae	Auletini	<i>Electrauletes</i> Legalov, 2015	<i>E. unicus</i> Legalov, 2015	BalJ
			<i>Eoropseudauletes</i> Kania et Legalov, 2019	<i>E. plucinskii</i> Kania et Legalov, 2019	BalJ
			<i>Pseudomesauletes</i> Legalov, 2001	<i>P. groehni</i> Bukejs et Legalov, 2019	RovJ
		Rhynchitini	<i>Eocenorhynchites</i> Legalov, 2012	<i>E. vossi</i> Legalov, 2012	BalJ
			<i>Succinorhynchites</i> Legalov, 2013	<i>S. alberti</i> Legalov, 2013	BalJ
Brentidae	Apioninae	Rhadinocybini	<i>Baltocyba</i> Legalov, 2018	<i>B. electrinus</i> Legalov, 2018	BalJ
		Notapionini	<i>Archinvolvulus</i> Voss, 1972	<i>A. liquidus</i> Voss, 1972	BalJ
		Palaeotanaini	<i>Palaeotanaos</i> Kirejtshuk, Legalov et Nel, 2015	<i>P. oisensis</i> Kirejtshuk, Legalov et Nel, 2015	OisJ
		Aspidapiini	<i>Pseudaspidapion</i> Wanat, 1990	<i>P. khnzoriani</i> (Zherikhin, 1971)	BalJ
			<i>Baltoapion</i> <b>gen. nov.</b>	<i>B. gusakovi</i> (Legalov, 2015), <b>comb. nov.</b>	BalJ
				<i>B. subdiscedens</i> (Voss, 1953), <b>comb. nov.</b>	BalJ
		Kalcapiini	<i>Melanapion</i> Wagner, 1930	<i>M. poinari</i> Legalov, 2015	BalJ
				<i>M. wanati</i> Legalov, 2012	BalJ
			<i>Succinapion</i> Legalov et Bukejs, 2014	<i>S. telnovi</i> Legalov et Bukejs, 2014	BalJ
		Piezotrachelini	<i>Conapium</i> Motschulsky, 1866	<i>C. allenii</i> Legalov, 2012	BalJ
			<i>Baltoconapium</i> <b>gen. nov.</b>	<i>B. anderseni</i> (Voss, 1972), <b>comb. nov.</b>	BalJ
			<i>Electrapion</i> Wagner, 1924	<i>E. kuntzeni</i> (Wagner, 1924)	BalJ
	Nanophyinae	Nanophyini	<i>Baltonanophyes</i> Legalov, 2018	<i>B. crassirostre</i> Legalov, 2018	BalJ
Curculionidae	Eirrhinae	Dorytomini	<i>Dorytomus</i> Germar, 1817	<i>D. bukejsi</i> <b>sp. nov.</b>	BalJ
				<i>D. electrinus</i> Legalov, 2016	BalJ
				<i>D. groehni</i> Bukejs et	

			Legalov, 2019		
			<i>D. korotyaevi</i> <b>sp. nov.</b>	BalJ	
			<i>D. nudus</i> Legalov, 2016	BalJ	
			<i>D. vlaskini</i> Legalov, Nazarenko et Perkovsky, 2019	BalJ	
Molytinae	Acicnemidini	<i>Electrotribus</i> Hustache, 1942	<i>E. henningseni</i> (Voss, 1972), <b>comb. nov.</b>	BalJ	
		= <i>Paleopissodes</i> Ulke, 1947	<i>E. theryi</i> Hustache, 1942	BalJ	
		= <i>Anchorthorrhinus</i> Voss, 1953	= <i>Paleopissodes weigangae</i> Ulke, 1947, <b>syn. nov.</b>		
		= <i>Isalcidodes</i> Voss, 1953	= <i>Anchorthorrhinus incertus</i> Voss, 1953		
		= <i>Protoceletes</i> Rheinheimer, 2007	= <i>Isalcidodes macellus</i> Voss, 1953		
			<i>E. wolfschwenningerae</i> (Rheinheimer, 2007)	BalJ	
			<i>E. rarus</i> <b>sp. nov.</b>	BalJ	
	Plinthini	<i>Leiosoma</i> Stephens, 1829	<i>L. klebsi</i> Legalov, 2016	BalJ	
	Sciabregmini	<i>Sciabregma</i> Scudder, 1893	<i>S. squamosa</i> Legalov, Kirejtshuk et Nel, 2019	OisJ	
	Aedemonini	<i>Electrorhinus</i> <b>gen. nov.</b>	<i>E. friedhelmi</i> <b>sp. nov.</b>	BalJ	
	Cryptorhynchini	<i>Oisecalles</i> Legalov, Kirejtshuk et Nel, 2019	<i>O. latosquamosus</i> Legalov, Kirejtshuk et Nel, 2019	OisJ	
		<i>Succinacalles</i> Zherikhin, 1971	<i>S. unicus</i> Zherikhin, 1971	BalJ	
Dryophthorinae	Dryophthorini	<i>Rhinoporkus</i> Legalov, Kirejtshuk et Nel, 2019	<i>Rh. graciosus</i> Legalov, Kirejtshuk et Nel, 2019	OisJ	
	Stromboscerini	<i>Palaeodexipeus</i> Legalov, 2016	<i>P. kirejtshuki</i> Legalov, 2016	BalJ	
		<i>Rovnoslonik</i> Legalov, Nazarenko et Perkovsky, 2019	<i>R. damzeni</i> Legalov, Nazarenko et Perkovsky, 2019	RovJ	
		<i>Stenommatomorphus</i> Nazarenko, 2009	<i>S. hexarthrus</i> Nazarenko, 2009	RovJ	
Cossoninae	Dryotribini	<i>Ampharthropelma</i> Voss, 1972	<i>A. decipiens</i> Voss, 1972	BalJ	
		<i>Caulophilus</i> Wollaston, 1854	<i>C. martynovae</i> Legalov, Nazarenko et Perkovsky, 2019	RovJ	
			<i>C. rarus</i> Legalov, 2016	BalJ	
			<i>C. squamosus</i> Legalov, 2016	BalJ	
			<i>C. sucinopunctatus</i> (Kuska, 1992)	BalJ	
			<i>C. zherikhini</i> Nazarenko, Legalov et Perkovsky, 2011	RovJ	
			<i>Necrodryophthorus</i> Voss, 1953	<i>N. inquilinus</i> Voss, 1953	BalJ
			<i>Synommatodes</i> Voss, 1953	<i>S. patruelis</i> (Voss, 1953)	BalJ
	<i>Electrocossonus</i> <b>gen. nov.</b>	<i>E. kirejtshuki</i> <b>sp. nov.</b>	BalJ		
Conoderinae	Ceutorhynchini	<i>Ceutorhynchus</i> Germar, 1824	<i>C. alekseevi</i> Legalov, 2016	BalJ	
			<i>C. electrinus</i> Legalov, 2016	BalJ	
			<i>C. succinus</i> Legalov, 2013	BalJ	
		<i>Baltocoeliodes</i> Legalov et Bukejs, 2018	<i>B. sontagae</i> Legalov et Bukejs, 2018	BalJ	
	Conoderini	<i>Jantarhinus</i> Legalov, Kirejtshuk et Nel, 2019	<i>J. compressus</i> Legalov, Kirejtshuk et Nel, 2019	OisJ	
Curculioninae	Acalyptini	<i>Jantaronosik</i> Legalov, Kirejtshuk et Nel, 2019	<i>J. nebulosus</i> Legalov, Kirejtshuk et Nel, 2019	OisJ	

Curculionini	<i>Pseudoergania</i> Legalov, 2019	<i>P. perkovskyi</i> Legalov, 2019	BalJ
	<i>Baltocurculio</i> <b>gen. nov.</b>	<i>B. manukyani</i> <b>sp. nov.</b>	BalJ
Ellescini	<i>Succinostyphlus</i> Kusa, 1996	<i>S. mroczkowski</i> Kusa, 1996	BalJ
		= <i>Electrotribus erectosquamata</i> Rheinheimer, 2007, <b>syn. nov.</b>	BalJ
	<i>Pachytychius</i> Jekel, 1861	<i>P. eocenicus</i> Legalov, 2016	BalJ
Eugnomini	<i>Archaeoeugnomus</i> Legalov, 2016	<i>A. balticus</i> Legalov, 2016	BalJ
	<i>Anthoneueugnomus</i> <b>gen. nov.</b>	<i>A. barsevskisi</i> <b>sp. nov.</b>	BalJ
	<i>Mazurieugnomus</i> <b>gen. nov.</b>	<i>M. pilosus</i> <b>sp. nov.</b>	BalJ
	<i>Groehnius</i> Bukejs et Legalov, 2019	<i>G. electrum</i> Bukejs et Legalov, 2019	BalJ
Rhamphini		<i>G. parvum</i> <b>sp. nov.</b>	BalJ
	<i>Palaeorhamphus</i> Legalov, 2016	<i>P. damzeni</i> <b>sp. nov.</b>	BalJ
		<i>P. eichmanni</i> <b>sp. nov.</b>	BalJ
		<i>P. primitivus</i> Legalov, 2016	BalJ
Tychiini	<i>Orchestes</i> Illiger, 1798	<i>O. tatjanae</i> Legalov, 2016	BalJ
	<i>Tachyerges</i> Schoenherr, 1825	<i>T. hyperoche</i> Legalov et Poinar, in lit.	BalJ
	<i>Eocenesibinia</i> Legalov, 2015	<i>E. prussica</i> Legalov, 2016	BalJ
	<i>Paleodontopus</i> <b>gen. nov.</b>	<i>P. smirnovae</i> <b>sp. nov.</b>	BalJ
Curculioninae incertae sedis	"Protoceteles"	<i>P. hirtus</i> Nazarenko et Perkovsky, 2016	RovJ
Entiminae	Hyperini	<i>Palaeophelypera</i> Legalov, 2013	BalJ
	Tropiphorini	<i>Limalophus</i> Scudder, 1893	BalJ
		<i>Scuccinalophus</i> Legalov, 2016	BalJ
Eudiagogini	<i>Tolstonosik</i> Legalov, Kirejtshuk et Nel, 2019	<i>T. oisensis</i> Legalov, Kirejtshuk et Nel, 2019	OisJ
Anypotactini	<i>Paonaupactus</i> Voss, 1953	<i>P. gracilis</i> Legalov, Nazarenko et Perkovsky, 2019	BalJ
	= <i>Pareustolus</i> Voss, 1953	<i>P. katyae</i> Legalov, Nazarenko and Perkovsky, 2019	BalJ
	= <i>Protonaupactus</i> Zherikhin, 1971, <b>syn. nov.</b>	<i>P. microphthalmus</i> (Zherikhin, 1971)	BalJ
	= <i>Sucinophyllobius</i> Wanat et Borowiec, 1986	<i>P. sitonitoides</i> Voss, 1953	BalJ
		= <i>Polydrosus scheelei</i> Voss, 1953	
		= <i>Pyllobius cephalotes</i> Voss, 1972	
		= <i>Otiorhynchus pellucidipes</i> Voss, 1972	
		<i>P. sobrinus</i> (Voss, 1972)	BalJ
		<i>P. viridis</i> (Wanat et Borowiec, 1986)	BalJ
	<i>Arostropsis</i> Yunakov et Kirejtshuk, 2011	<i>A. groehni</i> Yunakov et Kirejtshuk, 2011	BalJ
Naupactini		<i>A. gusakovi</i> <b>sp. nov.</b>	BalJ
		<i>A. perkovskyi</i> Bukejs et Legalov, 2019	RovJ

		Polydrusini	<i>Polydrusus</i> Germar, 1817	<i>P. archetypus</i> Zherikhin, 1971	BalJ
				<i>P. zherikhini</i> <b>sp. nov.</b>	BalJ
					BalJ
			<i>Archaeosciaphilus</i> Legalov, 2012	<i>A. marshalli</i> Legalov, 2012	BalJ
		Trachyploeini	<i>Archaeocallirhopalus</i> Legalov, 2013	<i>A. alekseevi</i> Legalov et Bukejs, 2015	BalJ
				<i>A. larssoni</i> Legalov, 2013	BalJ
		Curculionidae incertae sedis	<i>Thryogenosoma</i> Voss, 1953	<i>Th. cariniger</i> (Motschulsky, 1857)	BalJ
			= <i>Eirrhinoides</i> Motschulsky, 1857 non Blanchard, 1849		
Platypodidae	Tesserocerinae	Tesserocerini	<i>Eoplatypus</i> Cognato et Smith, 2019	<i>E. jordali</i> Peris, Solórzano Kraemer et Cognato, 2017	BalJ
			<i>Cenocephalus</i> Chapuis, 1865	<i>C. aniskini</i> <b>sp. nov.</b>	BalJ
Scolytidae	Hylesininae	Hylastini	<i>Hylastes</i> Erichson, 1836	<i>H. aterites</i> Schedl, 1947	BalJ
			<i>Hylurgops</i> LeConte, 1876	<i>H. corpulentus</i> Schedl, 1947	BalJ
			= <i>Hylesinites</i> Germar, 1813	<i>H. dubius</i> (Hagedorn, 1906)	BalJ
			= <i>Hylastites</i> Hagedorn, 1906	<i>H. electrinus</i> (Germar, 1813)	BalJ
			= <i>Myelophilites</i> Hagedorn, 1907	<i>H. granulatus</i> (Schedl, 1947)	BalJ
			= <i>Hylescierites</i> Schedl, 1947	<i>H. pilosellus</i> Schedl, 1947	BalJ
				<i>H. schellwieni</i> (Hagedorn, 1906)	BalJ
				<i>H. tuberculatus</i> Schedl, 1947	BalJ
		Hylurgini	<i>Xylechinus</i> Chapuis, 1869	<i>X. mozelevskae</i> Petrov et Perkovsky, 2008	RovJ
			<i>Klesovia</i> Petrov et Perkovsky, 2018	<i>K. pubescens</i> Petrov et Perkovsky, 2018	RovJ
			<i>Xylechinites</i> Hagedorn, 1906	<i>X. anceps</i> Hagedorn, 1906	BalJ
		Phloeosinini	<i>Phloeosinus</i> Chapuis, 1869	<i>Ph. assimilis</i> (Schedl, 1947)	BalJ
			= <i>Phloeosinites</i> Hagedorn, 1906	<i>Ph. brunni</i> (Hagedorn, 1906)	BalJ
				<i>Ph. regimontanus</i> (Hagedorn, 1906)	BalJ
				<i>Ph. rehi</i> (Hagedorn, 1906)	BalJ
				<i>Ph. robustus</i> (Schedl, 1947)	BalJ
				<i>Ph. sexspinosus</i> (Schedl, 1947)	BalJ
				<i>Ph. tuberculifer</i> (Schedl, 1947)	BalJ
				<i>Ph. wolffi</i> (Schedl, 1947)	BalJ
		Polygraphini	<i>Carphoborus</i> Eichhoff, 1864	<i>C. keilbachi</i> (Schedl, 1947)	BalJ
			= <i>Carphoborites</i> Schedl, 1947	<i>C. posticus</i> (Schedl, 1947)	BalJ
	Scolytinae	Dryocoetini	<i>Taphramites</i> Schedl, 1947	<i>T. gnathotrichus</i> Schedl, 1947	BalJ
				<i>T. rovnoensis</i> Petrov et Perkovsky, 2008	RovJ
			<i>Taphrorychus</i> Eichhoff, 1878	<i>T. immaturatus</i> Schedl, 1947	BalJ

The Nemonychidae, a small family comprising the oldest weevils [12,84,95,96], is rare in amber [2,97–100]. Nemonychidae in Baltic amber is represented by one specialized species of a monotypic genus and tribe, which is characterized by more advanced features compared to modern representatives of Cimberidinae. *Kuschelomacer kerneggeri* is only present in Baltic amber and probably developed on *Pinus* like the recent species of this subfamily [96,101,102].



**Figure 13.** Composition of the species in fauna of Eocene amber.

The Anthribidae is quite rare in the fossil record, although it is diverse in modern tropics and subtropics [103]. Representatives of all three modern subfamilies are found in Eocene amber. The Urodontinae was recorded only for Baltic amber [62], but the specimen requires re-study. The Choraginae is found in Rovno amber. The island tribe Valenfriesiini is mainly represented by a monotypic genus. There is no doubt that Choraginae will be found in Baltic amber also. The Anthribinae is found in all Eocene ambers. The monotypic tribe Oiserhinini is described from Oise amber. The genus *Glaesotropis* from Zygaenodini in Late Eocene amber is the richest in species (10). One species of this genus was found in Rovno amber. Nine species of three subgenera of this genus are described from Baltic amber. *G. minor* is one of the most common amber Curculionoidea. The Mecocerini, Allandrini, and possibly Tropiderini are noted only in Baltic amber.

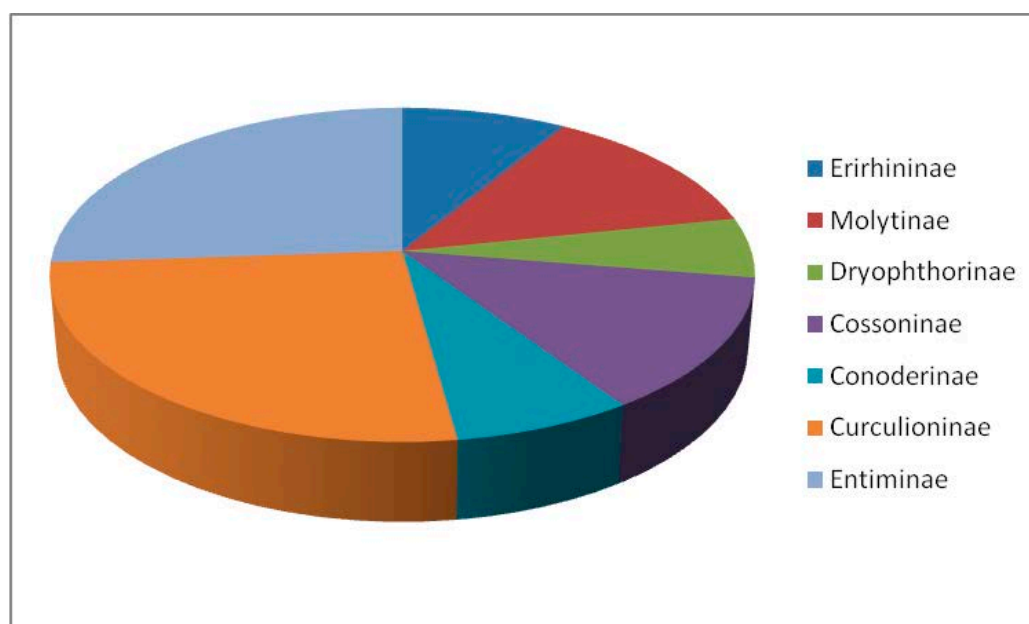
The Belidae is a relict group [5,104]. The Belinae are not found in amber. It is possible that, in the Eocene, it was absent in Europe. The Oxycoryninae is represented by several species of the modern genus *Oxycraspedus* Kuschel, 1955 (tribe Oxycraspedini) and two genera of Metrioxenini. Species of the genus *Oxycraspedus* that develop on *Araucaria* [105] are not yet discovered in Baltic amber. *Succinometrioxena poinari* is one of the common Curculionoidea of Baltic amber. Probably, like modern Metrioxenini [105], fossil species developed on palm trees. The Belidae only appears in Baltic amber.

The Rhynchitidae is rare in the fossil record [2]. The Sayrevilleinae is represented by Sanyrevilleini with five species of the genus *Baltocar*. It is absent in French and Rovno ambers. Two tribes, Auletini and Rhynchitini, are found in Late Eocene amber. The modern genus *Pseudomesauletes*, which is known from the Oriental region, Africa, Madagascar, North and Central America, and the terminal Eocene of USA [106], is represented by one species in Rovno amber. Four species from four extinct genera are also described in Baltic amber. The genus *Electrauletes* is similar to the modern Mediterranean genus *Auletes* Schoenherr, 1826 and probably also developed on Cupressaceae [107]. The genus *Eoropseudauletes* belongs to Pseudauletina of Auletinini that is now widespread only in the Neotropics [106]. Representatives of the advanced tribes Deporaini and Byctiscini were not found in the fossil state.

The Brentidae is represented in the Eocene ambers by the subfamilies Apioninae and Nanophyinae. The Apioninae is found in Oise and Baltic ambers. The genus *Palaeotanaos* with one species from the monotypic tribe Palaeotanaini is described from Oise amber, where it is the most common of the Curculionoidea [20]. The Baltic amber Apioninae fauna is quite rich and represented by 11 species from eight genera of Rhadinocybini, Notapionini, Aspidapiini, Kalcapiini and Piezotrachelini. The genera *Pseudaspidapion*, *Melanapion* and *Conapium* are represented in the modern fauna. The Nanophyinae was found only in Baltic amber, where it is represented by one primitive genus. The remaining subfamilies of the brentid family are absent in amber, although Brentinae is recorded from the Middle Eocene deposits of Germany [107–110].

The Curculionidae is the largest family of weevils in the modern fauna and also the largest family found in amber. Eight subfamilies (Eirrhinae, Molytinae, Lixinae, Dryophthorinae, Cossoninae, Conoderinae, Curculioninae, and Entiminae) are found in Eocene amber (Figure 14). The Cyclominae is extremely rare in the fossil record [2] and is not found in amber. Unfortunately, 13 tribes, from 40 tribes, noted in Baltic amber are known only from records [57,61] and their presence in amber requires confirmation. The Eirrhinae is represented by Eirrhini, Dorytomini, and Bagoini. The most diverse species of the genus *Dorytomus*, which are associated with Salicaceae, are found in Late Eocene amber. The Molytinae has nine tribes. These are forms confined to wood or plant litter. In Rovno amber, only Cryptorhynchini is noted, which is also found in Oise and Baltic amber. The Acicnemidini, Pissodini, Magdalinini, Molytini, Plinthini, Mecysolobini, and Aedemonini are known only in Baltic amber. The genus *Electrotribus*, one of the most widespread genera in Baltic amber, is absent in other ambers. The Lixinae is known only by record of the genus *Lixus* in Baltic amber. The Dryophthorinae is a diverse, mostly tropical group. Extant representatives of Dryophthorini and Stromboscerini that live under the bark of trees were found in all ambers. Free-living forms are not noted. Representatives of Cossoninae are common in Eocene and Miocene ambers [2,111,112]. They are also common in Rovno and Baltic amber, which explains their relationship with wood. Cossonines are not found in Oise amber. The Conoderinae is very rare in amber. Several species of the genus *Ceutorhynchus* develop on herbaceous vegetation, and one species of the genus *Baltocoeliodes* in Baltic amber is probably associated with woody angiosperms. An undescribed species of the genus *Ceutorhynchus* was discovered in Rovno amber. Representative of Conoderini are only found in the earliest Eocene Oise amber. The Bariditae is absent in Eocene ambers, but it is one of the usual forms in the Early–Middle Eocene Green River deposits and terminal Eocene of the Florissant [113,114]. The Curculioninae is diverse only in Baltic amber, where species from Curculionini, Ellescini, Anthonomini, Eugnomini, Rhamphini, Mecinini, Tychiini, and Camarotini are represented. It can be noted that Eugnomini is now distributed in the Chilean–Patagonian and Australian regions, and Camarotini in the New World. The extinct genus of Acalyptini is described from Oise amber. *Protoceletes hirtus* belonging to this subfamily was found in Rovno amber. The largest modern Entiminae is relatively poorly represented in amber. Only one species from Eudiagogini is described from Oise amber. Several species from Naupactini and Anypotactini are known in Rovno amber. Baltic amber Entiminae is more diverse. Representatives of Hyperini, Sitonini, Tropiphorini, Anypotactini, Naupactini, Polydrusini, and Trachyphloeini also are found in Baltic amber. Species of the genus *Paonaupactus* are common Baltic amber weevils. The earliest Eocene Oise amber is very different from Late Eocene amber. None of the known genera in Oise amber are found in Baltic and Rovno ambers. The South African tribe Conoderini and the American extinct tribe Sciabregmini and Recent Eudiagogini are not found in Late Eocene amber. Rovno amber at the tribal level is a depleted version of Baltic amber. While all the genera, excluding *Stenommatomorphus*, are general, all species are different.





**Figure 14.** Composition of the subfamilies of Curculionidae from Eocene amber.

The Platypodidae was recently discovered in Baltic amber. This is the extinct genus *Eoplatypus* with one species and the close American genus *Cenocephalus* with one species. The rarity of the Platypodidae fundamentally distinguishes the weevil faunas in Dominican and Baltic amber. Platypodidae is a massive group in Dominican amber [115].

The Scolytidae is a widely distributed group. Representatives of bark beetles from Oise amber are not described [20]. The fauna of Scolytidae of Rovno and Baltic amber is very different. Twenty-one species of bark beetles are described from Baltic amber. There are mainly species of the genera *Hylurgops* and *Phloeosinus*. Both of these genera are absent in Rovno amber. The Rovno amber genera, such as *Xylechinus* and *Klesovia*, were not found in Baltic amber. The genus *Taphramites* is common in both ambers, but it is represented by different species in Baltic and Rovno amber. Representatives of Hylesininae dominate in both ambers. The Scolytinae is represented by two genera of Dryocoetini.

To summarize, we can say that there are few similarities between the faunas of the earliest Eocene Oise amber and Late Eocene ambers. Rovno amber can be regarded as a depleted variant of Baltic amber, with no common species in their respective faunas.

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