Bulletin de la Société entomologique de France, **128** (4), 2023 : 495-506. ISSN 0037-928X
https://doi.org/10.32475/bsef_2296 eISSN 2540-2641

Updated checklist of Limoniidae and Pediciidae craneflies from Corsica, largely based on the *Our Planet Reviewed in Corsica 2019-2021* expeditions (Diptera)

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(Accepté le 27.XI.2023 ; publié le 15.XII.2023)

Abstract. – An updated checklist of the families Limoniidae (short-palped craneflies) and Pediciidae (hairy-eyed craneflies) from Corsica is presented here, based mostly upon collected material from the *Our Planet Reviewed in Corsica 2019-2021* expeditions led by the Muséum national d'Histoire naturelle in collaboration with, and funded by, the Collectivité de Corse and the Office Français de la Biodiversité. Additional material was collected by the lead author. The expeditions produced 63 species, with ten first records for the island, including two new to the French fauna, and one species new to science. The current Corsican fauna of Limoniidae and Pediciidae now includes 90 species of Limoniidae and 12 of Pediciidae.

Résumé. – **Mise à jour de la liste des Limoniidae et Pediciidae de Corse, majoritairement sur la base des expéditions *La Planète Revisitée en Corse 2019-2021* (Diptera)**. La liste des Limoniidae et Pediciidae de Corse est mise à jour, en se basant sur les collectes réalisées par le programme *La Planète Revisitée en Corse 2019-2021,* mené par le Muséum national d'Histoire naturelle en collaboration avec la Collectivité de Corse et l'Office Français de la Biodiversité, et complétée par certaines collectes du premier auteur. Cette expédition a permis de retrouver 63 espèces, dont dix sont nouvelles pour la faune de l'île (et deux pour la faune française) et une espèce nouvelle pour la science. La faune de Corse actuellement connue est composée de 90 espèces de Limoniidae et de 12 espèces de Pediciidae.

Keywords. – Faunistics, France, new records.

Limoniidae and Pediciidae are two Nematocera families included in the Tipulomorpha infraorder, one of the larger groups in the order Diptera. Those have long been poorly studied in France, with only few entomologists recording them over the last century (Pierre, 1924; Thomas, 1977; Geiger *et al.*, 1994; etc.).

Limoniidae have a high diversity in France, with 304 known species, as compared to 40 species of Pediciidae (Oosterbroek, 2023). With such a diversity, they have colonized a wide range of habitats, from marine —seashore algae, e.g., some *Geranomyia* Haliday, 1833 (Poisson, 1932)— to alpine habitats (diverse genera, i.e., *Dactylolabis* Osten Sacken, 1860, including some peculiar species with atrophied wings). These families even comprise a genus with an adult phase adapted to winter conditions in mountains, regularly found on snow (*Chionea* Dalman, 1816). However, their highest diversity is found in diverse wet habitats, such as rivers banks, marshes and bogs. In most species, larvae are saprophagous or saproxylophagous —for example *Dicranomyia modesta* (Meigen, 1818) (fig. 6)—, while the larval stages in a few species are micropredators (Pediciinae, and numerous species of Limnophilinae) (Oosterbroek, 2006). Some genera are even mycophagous (Ulininae, *Metalimnobia* Matsumura, 1911) (Oosterbroek, 2006).

A first list of the Limoniidae species recorded from Corsica (subsequently split into Limoniidae and Pediciidae) based on a range of source material included a total of 90 species (Podenas *et al.*, 1997). This list was the result of the assemblage of the occasional bibliographical sources and multiple collections. Corsica was, until recently, the only French region with a checklist for those families, and, in that respect, its limoniid and pediciid fauna has long been one of the best known in France.

Since the publication of this checklist, and prior to the present publication, the number increased to 95 species based on data from the Catalogue of Craneflies of the World website (Oosterbroek, 2023). Three additional records originated from some literature records overlooked by Podenas *et al*. (1997) and include the following species: *Pedicia* (*Crunobia*) *littoralis* (Meigen, 1804), *Pseudolimnophila* (*Pseudolimnophila*) *lucorum* (Meigen, 1818) and *Limonia flavipes* (Fabricius, 1787) (Lackschewitz, 1928, 1940). In addition, the *Our Planet Reviewed in Corsica 2019-2021* expeditions (see further) produced two first records for the island, *Lipsothrix remota* (Walker, 1848) and *Tasiocera exigua* Savchenko, 1973 (Kolcsár *et al.,* 2021), and a new species to science, *Molophilus zonzensis* Boardman & Starý, 2020 (Boardman & Starý, 2020). On the other hand, *Molophilus medius* de Meijere, 1918 — originally added by Edwards (1928) — was removed on the basis of an uncertain identity of female material, while the identity of the reported *Dicranomyia luteipennis* Goetghebuer, 1920, by Podenas *et al*. (1997) was later corrected to *D. pallidinota* (Starý, 2009a).

Material and methods

The list below is boosted by material collected during the *Our Planet Reviewed in Corsica 2019-2021* program (see http://laplanetevisitee-corse.mnhn.fr) led by the Muséum national d'Histoire naturelle (MNHN, Paris, France). Touroult et al. (2023) describe the general framework, studied areas, sampling methodologies, and preliminary results of this survey. Nineteen sites in the north and southeast of the island were surveyed according to a semi-standardised protocol, and a large-scale trapping scheme was organised in three sites. Sampling efforts mainly focused on forested habitats at higher altitudes (2019) and on coastal dune and marshland habitats (2021). They included a vast array of methods to collect invertebrates, with a special effort on flight-interception traps and pan traps. Two Diptera experts were actively involved in fieldwork activities, i.e., the last author (MP) as Diptera coordinator and taxonomic expert of Dolichopodidae, and Thomas Lebard as taxonomic expert of Syrphidae/Stratiomyidae. During 2019 and 2021, the Diptera coordinator concentrated sampling efforts on the use of pan traps, while both researchers also used sweep nets for collecting. Specimen collection from the sweep net followed two procedures: specimens were either retrieved individually from the net in the field (SW), or the entire unsorted yield was transferred to a collecting jar with alcohol for subsequent sorting (MSW). In each of these years (23-30.VI.2019, 18-26.V.2021), a total of 16 sampling sites at four different locations were selected for pan trapping. In each site, five trap units were operational for 3-4 days. A trap unit is composed of one blue, one yellow and one white plastic bowl (inner diameter: 15 cm, depth: 4 cm), that are installed close together at soil surface level. Traps are fixed to the soil with metal pins and two-thirds filled with a mild formaline solution and detergent. In 2019, this approach was applied in the mountainous region of Alta Rocca (south) (fig. 1-2) whereas lowland marshes and dune habitats were investigated in this way in the coastal area of southeastern Corsica (fig. 3-4) in 2021. Limoniid and pediciid samples were disseminated by the Diptera coordinator of the expedition to taxonomic experts. Identifications of the specimens were carried out by first, second, and third authors with various iterations.

Fig. 1-4. – Sampling sites of the *Our Planet Reviewed in Corsica 2019-2021* expeditions with valuable species of Limoniidae. – **1**, Serra-di-Scopamène (2A278), Campu di Bonza, seep on river bank in oak forest, habitat of e.g., *Hexatoma* (*Eriocera*) *schnusei*. – **2**, Same location, gravelly muddy seep in deciduous forest, habitat of e.g., *Baeoura directa* and *Lipsothrix remota*. – **3**, Serra-di-Scopamène, Castellu d'Ornucciu, shady site along stream in pozzine landscape, habitat of e.g., *Gonomyia* (*Gonomyia*) *theowaldi* and *Tasiocera* (*Dasymolophilus*) *exigua*. – **4**, Zonza, Samulaghia, marshy seep in dry fir forest, habitat of e.g., *Dicranota* (*Ludicia*) *trifurcata. (Photos by Marc Pollet).*

Results

The entire *Our Planet Reviewed* expeditions produced 876 samples that contained Diptera, including 102 with Limoniidae and/or Pediciidae. The sampling campaign in the mountains of Alta Rocca proved most productive with 77 samples, as compared to only eight in 2020 and 17 in the coastal region of southeastern Corsica (2021). These samples contained 1,111 specimens of Limoniidae and Pediciidae. In addition, fieldwork by the first author in IX.2020, III.2021, IX.2021 and X.2022 produced another 278 specimens.

The combined set of samples contained a total of 64 species of Limoniidae and seven of Pediciidae, including ten species that are first recorded from Corsica.

Checklist of Limoniidae and Pediciidae from Corsica

!: species recorded for the first time from Corsica, with the exception of the three new species from Corsica produced by the expedition and already published by Boardman & Starý (2020) and Kolcsár *et al.* (2021).

*: species collected during the *Our Planet Reviewed in Corsica 2019-2021* program or by the first author during his fieldwork.

?: doubtful records from Corsica.

Family **Limoniidae** Rondani, 1856

Subfamily **Chioneinae** Rondani, 1861

Baeoura directa (Kuntze, 1914)*
Cheilotrichia (*Empeda*) *cinerascens* (Meigen, 1804)
Crypteria (*Crypteria*) *limnophiloides* Bergroth, 1913*
! *Ellipteroides* (*Protogonomyia*) *alboscutellatus* (von Roser, 1840)
Erioptera (*Erioptera*) *fuscipennis* Meigen, 1818*
Erioptera (*Erioptera*) *lutea lutea* Meigen, 1804*
Gonomyia (*Gonomyia*) *conoviensis* Barnes, 1924
Gonomyia (*Gonomyia*) *tenella* (Meigen, 1818)*
Gonomyia (*Gonomyia*) *theowaldi* Starý, 1982*
Hoplolabis (*Parilisia*) *yezoana* (Alexander, 1924)
Idiocera (*Idiocera*) *alexanderiana* (Lackschewitz, 1940)

Idiocera (*Idiocera*) *antilopina* Starý, 1982
! *Idiocera* (*Idiocera*) *sziladyi* (Lackschewitz, 1940)*
Ilisia maculata (Meigen, 1804)
Molophilus (*Molophilus*) *ater* (Meigen, 1804)
Molophilus (*Molophilus*) *bifidus* Goetghebuer, 1920*
Molophilus (*Molophilus*) *corniger* de Meijere, 1920
Molophilus (*Molophilus*) *griseus* (Meigen, 1804)*
Molophilus (*Molophilus*) *obscurus* (Meigen, 1818)*
Molophilus (*Molophilus*) *pleuralis* de Meijere, 1920
Molophilus (*Molophilus*) *zonzensis* Boardman & Starý, 2020*
Neolimnophila placida (Meigen, 1830)
Ormosia (*Ormosia*) *hartigi* Mendl, 1973
Ormosia (*Ormosia*) *hederae* (Curtis, 1835)
! *Rhabdomastix* (*Rhabdomastix*) *incapax* Starý, 2005*
Rhypholophus bifurcatus Goetghebuer, 1920
Rhypholophus dufouri Geiger & Podenas, 1993*
Rhypholophus haemorrhoidalis (Zetterstedt, 1838)
Symplecta (*Psiloconopa*) *stictica stictica* (Meigen, 1818)*
Symplecta (*Symplecta*) *hybrida* (Meigen, 1804)
Symplecta (*Trimicra*) *pilipes* (Fabricius, 1787)
Tasiocera (*Dasymolophilus*) *exigua* Savchenko, 1973*
Tasiocera (*Dasymolophilus*) *murina* (Meigen, 1818)*

Subfamily **Dactylolabinae** Alexander, 1920

Dactylolabis (*Dactylolabis*) *anomala* (Kuntze, 1913)
Dactylolabis (*Dactylolabis*) *corsicana* Edwards, 1928
Dactylolabis (*Dactylolabis*) *nubecula* Kuntze, 1913

Subfamily **Limnophilinae** Bigot, 1854

Austrolimnophila (*Austrolimnophila*) *latistyla* Starý, 1977*
Austrolimnophila (*Austrolimnophila*) *ochracea* (Meigen, 1804)*
Dicranophragma (*Brachylimnophila*) *adjunctum* (Walker, 1848)*
Dicranophragma (*Brachylimnophila*) *nemorale* (Meigen, 1818)*
Eloeophila apicata (Loew, 1871)*
Eloeophila czernyi (Strobl, 1909)*
Eloeophila laciniata (Edwards, 1928)
Eloeophila maculata (Meigen, 1804)*
Eloeophila pusilla (Kuntze, 1920)
Eloeophila verralli (Bergroth, 1912)*
Hexatoma (*Eriocera*) *schnusei* (Kuntze, 1913)*
Hexatoma (*Hexatoma*) *fuscipennis* (Curtis, 1836)*
Hexatoma (*Hexatoma*) *gaedii* (Meigen, 1830)*
Neolimnomyia filata (Walker, 1856)*
Paradelphomyia senilis (Haliday, 1833)
Phylidorea (*Phylidorea*) *ferruginea* (Meigen, 1818)*
Pilaria discicollis (Meigen, 1818)*
Pilaria fuscipennis (Meigen, 1818)*
Pseudolimnophila (*Pseudolimnophila*) *lucorum* (Meigen, 1818)*
Pseudolimnophila (*Pseudolimnophila*) *sepium* (Verrall, 1886)*

Subfamily **Limoniinae** Rondani, 1856

Antocha (*Antocha*) *vitripennis* (Meigen, 1830)*
! *Achyrolimonia decemmaculata* (Loew, 1873)*
! *Atypophthalmus* (*Atypophthalmus*) *inustus* (Meigen, 1818)*
! *Dicranomyia* (*Dicranomyia*) *affinis* (Schummel, 1829)
Dicranomyia (*Dicranomyia*) *chorea* (Meigen, 1818)*
Dicranomyia (*Dicranomyia*) *didyma* (Meigen, 1804)*
Dicranomyia (*Dicranomyia*) *goritiensis* (Mik, 1864)
! *Dicranomyia* (*Dicranomyia*) *lucida* de Meijere, 1918*
Dicranomyia (*Dicranomyia*) *melanantha* Savchenko, 1984*
Dicranomyia (*Dicranomyia*) *micronychia* Lackschewitz, 1941
Dicranomyia (*Dicranomyia*) *mitis* (Meigen, 1830)?
Dicranomyia (*Dicranomyia*) *modesta* (Meigen, 1818)*
Dicranomyia (*Dicranomyia*) *ornata* (Meigen, 1818)?
Dicranomyia (*Dicranomyia*) *pallidinota* Starý, 2009*
Dicranomyia (*Dicranomyia*) *sera* (Walker, 1848)
Dicranomyia (*Dicranomyia*) *signatella* Starý & Freidberg, 2007
Dicranomyia (*Glochina*) *sericata* (Meigen, 1830)
Dicranomyia (*Idiopyga*) *lackschewitzi* Edwards, 1928
Dicranomyia (*Melanolimonia*) *hamata* Becker, 1908
Dicranomyia (*Melanolimonia*) *morio* (Fabricius, 1787)*
Dicranomyia (*Numantia*) *fusca* (Meigen, 1804)*
Dicranomyia (*Sivalimnobia*) *aquosa* Verrall, 1886*
Dicranoptycha fuscescens (Schummel, 1829)*
Geranomyia caloptera Mik, 1867*
Helius (*Helius*) *calviensis* Edwards, 1928*
Helius (*Helius*) *longirostris longirostris* (Meigen, 1818)
Limonia flavipes (Fabricius, 1787)
Limonia macrostigma (Schummel, 1829)*
Limonia nubeculosa Meigen, 1804*
Limonia phragmitidis (Schrank, 1781)*
Lipsothrix remota (Walker, 1848)*
Neolimonia dumetorum (Meigen, 1804)*
Rhipidia (*Rhipidia*) *ctenophora* Loew, 1871*
! *Rhipidia* (*Rhipidia*) *punctiplena* Mik, 1887*

Family **Pediciidae** Osten-Sacken, 1860

Subfamily **Pediciinae** Osten-Sacken, 1860

Dicranota (*Ludicia*) *trifurcata* (Edwards, 1928)*
Dicranota (*Paradicranota*) *brevitarsis* Bergroth, 1891

Dicranota (*Paradicranota*) *consimilis* Mendl, 1987*
Dicranota (*Paradicranota*) *fuscipennis* Lackschewitz, 1940
Dicranota (*Paradicranota*) *gracilipes* Wahlgren, 1905*
Dicranota (*Paradicranota*) *schistacea* Lackschewitz, 1940
Dicranota (*Paradicranota*) *subtilis* Loew, 1871
Pedicia (*Amalopis*) *occulta* (Meigen, 1830)*
Pedicia (*Crunobia*) *littoralis* (Meigen, 1804)
Pedicia (*Crunobia*) *zangheriana* Nielsen, 1950*
Tricyphona (*Tricyphona*) *immaculata* (Meigen, 1804)*

Subfamily **Ulinae** Alexander, 1920

Ula (*Ula*) *mollissima* Haliday, 1833*

The number of Limoniidae and Pediciidae currently known from Corsica as based on existing knowledge from the CCW website (Oosterbroek, 2023), the material collected during the *Our Planet Reviewed in Corsica 2019-2021* expeditions, and during fieldwork by the first author is as follows (format: [*total number of species*] species (LPR: [*number of species collected during the* Our Planet Reviewed in Corsica 2019-2021 *expeditions*]; QC: [*number of species collected by the first author, QC*]):

– Limoniidae subfamily Chioneinae: 33 species (LPR: 13; QC: 6), subfamily Dactylolabinae: 3 (LPR: 0; QC: 0), subfamily Limnophilinae: 20 (LPR: 11; QC: 7), subfamily Limoniinae: 34 (OPR: 14; QC: 11);

– Pediciidae: Pediciinae 11 (LPR: 5; QC: 3). 1 Ulinae (LPR: 1).

Dicranomyia (*Dicranomyia*) *consimilis* (Zetterstedt, 1838) has been removed from the checklist (see further). As for the status of *Molophilus* (*Molophilus*) *medius* de Meijere, 1918, and *Dicranomyia* (*Dicranomyia*) *luteipennis* Goetghebuer, 1920, see comments above.

Remarks on some species

We consider here endemic species those that are only known from Corsica, or Corsica and Sardinia (Corso-Sardinian endemics).

Species records are given in the following format: **Corsican Department**: locality (INSEE code), location, latitude, longitude, altitude, collecting date/period, collector name, number of males and/or females.

Family **Limoniidae**

Subfamily **Chioneinae**

Baeoura directa (Kuntze, 1914)

It is a species of restricted range, only known from Sicily and Corsica. Three females and four males were collected in riparian pine and green oak forest, on the bank of a river or brook bed in oak forest, on a gravelly muddy seep in deciduous forest, canopied humid sandy area on riverbank and on rocks in an alder-fir forest at altitudes ranging from 17 to 1,271 m.

Haute-Corse: 2 ♀, Mausoléo (2B156), Tartagine, 42°29’39.483”N, 8°59’29.348”E, 760 m, 2-5.VII.2019, *leg. Claire Villemant*; 1 ♀, Solenzara (2A269), mouth of river Travo, 41.90783°N, 9.40830°E, 17 m, 25.V.2021, *leg. Marc Pollet*. **Corse-du-Sud**: 1 ♂, Serra di Scopamène (2A278), Campu di Bonza (fig. 2), 41°46’28.3”N, 9°07’26.9E, 845 m, 23-27.VI.2019, *leg. Marc Pollet*; 1 ♂, same location, 41°46’21.5”N, 9°07’15.8E, 920 m, 23-27.VI.2019, *leg. Marc Pollet*; 1 ♂, same location, 41°46’21.9”N, 9°07’15.1”E, 934 m, 23-27.VI.2019, *leg. Marc Pollet*; 1 ♂, Zonza (2A362), Samulaghia, 41°45’42.26”N, 9°13’39.99”E, 1,271 m, 28.VI.2019, *leg. Marc Pollet & Anja De Braekeleer*.

Ellipteroides* (*Protogonomyia*) *alboscutellatus (von Roser, 1840)

First record for Corsica. This species is widespread in Europe, and known to be associated with calcareous seepages in woodland in the United Kingdom (especially with tufa). The larvae are semi-aquatic and found at tufa-associated bryophytes (Stubbs, 2003).

Corse-du-Sud: 1 ♂, Sorbollano (2A285), 42°29’39.483’’N, 8°59’29.348’’E, 877 m, 23-27.VI.2019, *leg. Romain Le Divelec*.

Gonomyia* (*Gonomyia*) *theowaldi Starý, 1982

Endemic species, known only from Corsica and Sardinia, from sites between 1,050 and 1,150 m (Podenas *et al.*, 1997). Eight males were collected in riparian pine and green oak forest, on dry rocks near seep in fir forest, and in pozzine landscapes along open or shady stream, between 760 and 1,568 m.

Haute-Corse: 1 ♂, Mausoléo (2B156), Tartagine, 42°29’39.483’’N, 8°59’29.348’E, 760 m, 2-5.VII.2019, *leg. Claire Villemant*. **Corse-du-Sud**: 5 ♂, Serra di Scopamène (2A278), Castellu d’Ornucciu (fig. 3), 41°50’00.5”N, 9°09’27.6”E, 1,568 m, 26-30.VI.2019, *leg. Marc Pollet*; 1 ♂, Serra di Scopamène (2A278), Castellu d’Ornucciu, 41°50’02.9”N, 9°09’24.2”E, 1,559 m, 26-30.VI.2019, *leg. Marc Pollet*; 1 ♂, Zonza (2A362), Samulaghia, 41°45.703’N, 9°13.649’E, 1,208 m, 24-28.VI.2019, *leg. Marc Pollet*.

Idiocera* (*Idiocera*) *antilopina Starý, 1982

A species of restricted range, only known from Sicily (one location: 1,200-1,300 m) and Corsica (one location: Tavignano river, see original description and Podenas *et al.*, 1997).

Idiocera* (*Idiocera*) *sziladyi (Lackschewitz, 1940)

First record for Corsica and France. This species has a large but really sporadic distribution. The species was reported by mistake from central France (Kolcsár et *al.*, 2021) by the first author, based on incorrect identifications of specimens that belonged to *I. alexanderiana*. The species is regarded in the Czech Republic as a “local, ecologically significant species, associated with sandy or gravelly banks of larger streams” (Starý & Vonicka, 2018).

The collected specimen originated from an open riparian zone, with old poplars and grassy vegetation (J. Touroult, pers. comm.).

Haute-Corse: 1 ♂, Oletta (2B185), 42°29’39.483’’N, 8°59’29.348’’E, 10 m, 18-26.VI.2020, *leg. Julien Touroult*.

Molophilus* (*Molophilus*) *zonzensis Boardman & Starý, 2020

Endemic species, discovered during the *Our Planet Reviewed in Corsica 2019-2021* expeditions (Boardman & Starý, 2020).

Haute-Corse: 1 ♂, Zonza (2A3562), Samulaghia, 41°45’40.1”N, 9°13’32.9”E, 1,231 m, 24-28.VI.2019, *leg. Marc Pollet*; 2 ♂, Zicavo (2A359), Ponte di Valpine, 41°52’26.3”N, 9°08’08.4”E, 1,286 m, 25-29.VI.2019, *leg. Marc Pollet*; 3 ♂, Serra di Scopamène (2A278), Castellu d’Ornucciu, 41°50’00.5”N, 9°09’27.6”E, 1,568 m, 26-30.VI.2019, *leg. Marc Pollet*.

Ormosia* (*Ormosia*) *hartigi Mendl, 1973

Known only from Corsica and Calabria (Italy). Recorded in Corsica from a stream in the maquis at 700 m (Podenas *et al.*, 1997), and in Calabria (description) from a site at 1,300 m.

Rhabdomastix* (*Rhabdomastix*) *incapax Starý, 2005

Endemic species, first record for Corsica and previously only known from Sardinia (Starý & Roháček, 2015) from two localities separated by less than 10 km. Sardinian habitats were described as “*Eleocharis palustris* and *Juncus* sp. patches on sandy to muddy banks of the Éleme river.”, and “slowly flowing brook with marshy littoral vegetation, containing, among other plants, low growths of a small *Juncus* sp.”. A single female has been discovered during

Our Planet Reviewed in Corsica 2019-2021 expeditions, and its identity was confirmed by the third author. This species is quite particular in its genus, with both sexes having reduced wings and unable to fly.

Corse-du-Sud: 1 ♀, Sotta (2A288), Valavo, 42°29'39.483''N, 8°59'29.348''E, 118 m, 19.V.2021, *leg. J.-C. Streito*.

Rhypholophus dufouri Geiger & Podenas, 1993

A species only known from Corsica between 1,000 and 1,800 m. The only record is that from the original description. An older record of *R. bifurcatus* from Corsica possibly refers to this closely related species. Specimens reported here were caught along an altitudinal stream with numerous *Alnus* trees alongside. The second location is quite different, i.e., a muddy seepage in a chestnut forest, with scattered low plants.

Corse-du-Sud: 4 ♂, 1 ♀, Bastelicca (2A031), Val d'Ese, 42°29'39.483''N, 8°59'29.348''E, 1,700 m, 23.IX.2021, *leg. C. Quindroit*; 2 ♂, 1 ♀, Quascara (2A253), fonteta di Patricciola, 41°54'28.717''N, 9°0'5.255''E, 850 m, 5.X.2022, *leg. C. Quindroit*.

Tasiocera* (*Dasymolophilus*) *exigua Savchenko, 1973

This is a widespread species in Europe, from Scandinavia to northern Italy, Serbia and Ukraine. Still unknown from continental France, and reported from Corsica by Kolcsár *et al.* (2021) on the basis of specimens found during the initial phase of the *Our Planet Reviewed in Corsica 2019-2021* expeditions. It is a brook specialist, sometimes found in ditches (Autio & Salmela, 2010).

Corse-du-Sud: 8 ♂, 2 ♀, Serra di Scopamène (2A278), Castellu d'Ornucciu, in a shady site along stream in pozzine landscape (fig. 3), 41°50'00.5"N, 9°09'27.6"E, 1,568 m, 26-30.VI.2019, *leg. Marc Pollet*.

Subfamily **Dactylolabinae**

Dactylolabis* (*Dactylolabis*) *anomala (Kuntze, 1913)

Corsican endemic. Five records, the last from 1981, and only two with altitude mentioned: 1,250-1,350 m (Podenas *et al.*, 1997).

Dactylolabis* (*Dactylolabis*) *corsicana Edwards, 1928

Endemic for Corsica and Sardinia. Listed as abundant by Edwards (1928) "wherever a thin film of water runs over large rocks, often in the company of one of the other *Dactylolabis* species". We add here an unpublished record of a specimen found in the MNHN collections, from a locality already mentioned by Edwards (1928):

Corse-du-Sud: 1 ♂, Evisa (2A108), forêt d'Aïtone, 31.V.1972, *coll. L. Matile* (MNHN), det. C. Quindroit (fig. 5).

Dactylolabis* (*Dactylolabis*) *nubecula Kuntze, 1913

Endemic to Corsica. Four records, only one with altitude mentioned: 700 m (Podenas *et al.*, 1997).

Subfamily **Limnophilinae**

Eloeophila laciniata (Edwards, 1928)

Endemic to Corsica and Sardinia. Described from "a marsh at river mouth" (Edwards, 1928). Listed up to 670 m altitude (Starý, 2009b).

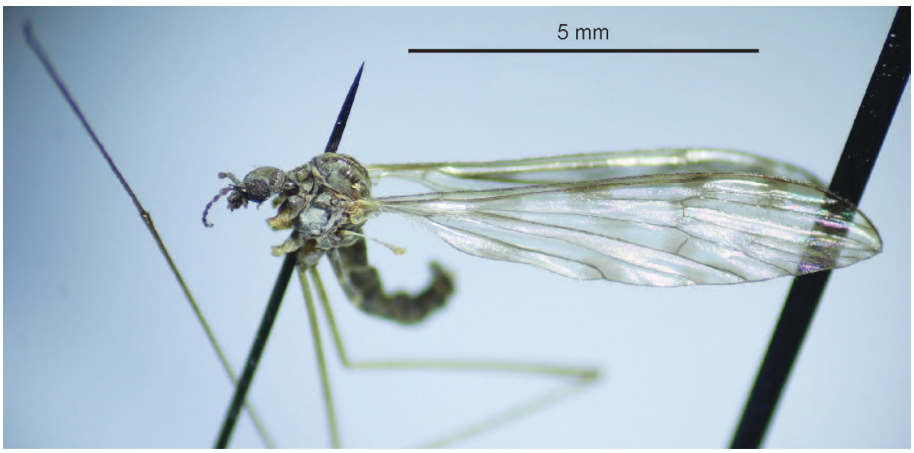

Fig. 5. – *Dactylolabis* (*Dactylolabis*) *corsicana* Edwards, 1928, ♂, Evisa (2A108), forêt d'Aïtone, 31.V.1972, *coll L. Matile* (MNHN). *(Photo by C. Quindroit).*

Eloeophila pusilla (Kuntze, 1920)

Endemic species of Corsica, only known by the five type specimens from Vizzavona "monte d'Oro" caught by W. Schnuse in 1899.

Hexatoma* (*Eriocera*) *schnusei (Kuntze, 1913)

Endemic, previously only known from four records from Corsica —Ajaccio and Vizzavona, 1,050 m, by Kuntze (1913); Asco by Gaunitz (1968); and Vizzavona 1,000-1,100 m by Podenas *et al.* (1997). Apparently, a species with a large altitudinal amplitude (although old records must be treated with care, as they are not always precise, e.g., Ajaccio has no river at an altitude above 200 m). Caught during the *Our Planet Reviewed in Corsica 2019-2021* expeditions between 855 and 1,568 m.

Corse-du-Sud: 2 ♂, Serra di Scopamène (2A278), Campu di Bonza, seep on riverbank in oak forest (fig. 1), 41°46'28.6"N, 9°07'25.3"E, 855 m, 27.VI.2019, *leg. Marc Pollet*; 3 ♂, Serra di Scopamène (2A278), Castellu d'Ornucciu, shady site along stream in pozzine landscape, 41°50'00.5"N, 9°09'27.6"E, 1,568 m, 26-30.VI.2019, *leg. Marc Pollet*; 2 ♂, Zonza (2A362), Samulaghia, rocky seep in fir forest, 41°45'40.1"N, 9°13'32.9"E, 1,231 m, 24-28.VI.2019, *leg. Marc Pollet*.

Subfamily **Limoniinae**

Dicranomyia* (*Dicranomyia*) *affinis (Schummel, 1829)

In his paper, Edwards (1928) reports this species from the Restonica Valley in Corsica. For a long time, *D. affinis* was treated as synonym of *D. mitis*, and has only recently been reinstated as valid species by Starý & Stubbs (2015). Old literature is quite difficult to use for this complex of species, however, Starý and Stubbs state that "present concept of the species conforms to that proposed by Edwards (1938) […] The original description (Schummel, 1829) is rather detailed and fits this species very well".

Also, this species is known from Sardinia as well, and therefore, *D. affinis* is accepted as listed from Corsica. There are further questions about the presence of *D. mitis* in Corsica, only reported by Vaillant (1952), as it was reported at a time when the two species where synonyms. Unfortunately, no specimens of *D. mitis* from Corsica could be examined.

Dicranomyia* (*Dicranomyia*) *consimilis (Zetterstedt, 1838)

This species is listed from Corsica by Kuntze (1913) from a specimen collected by Schnuse in 1899. Starý (1969) mentions a single specimen labelled "Korsica: 18.VII.1899, 1♂ (Schnuse; Czižek als "*consimilis*")", stored at Moravské zemské muzeum (Brno, Czech Republic) that belongs to *Dicranomyia didyma.* Therefore, as we believe that this specimen (number unmentioned) from VII.1899 collected by W. Schnuse (Kuntze, 1913) represents the only record of *D. consimilis* from Corsica, this species must be removed from the checklist of Corsica.

Dicranomyia* (*Dicranomyia*) *lucida de Meijere, 1918

This species has a wide distribution range in Europe, but is often found quite sporadically, in marshy areas, in particular marshy woodlands. In Grosseto-Prugna (see below), two female specimens were taken at sea level, in a riparian undergrowth of *Alnus*, together with *Helius calviensis, Rhipidia punctiplena* and a yet unidentified *Paradelphomyia* species.

Haute-Corse: 3 ♀, 2 ♂, Ventiseri (2B342), 41°54'27.1295"N, 9°24'27.8058"E; 41°54'36.3702"N, 9°24'28.1268"E; 41°54'26.6615"N; 9°24'26.532"E; 41°54'27.0714"N, 9°24'26.7474"E, 0-2 m, 6-25.V.2021, *leg. E. Poirier*. **Corse-du-Sud**: 1 ♀, Sotta (2A288), 41°54'24.9588"N, 9°24'28.0542"E, 0 m, 6-25.V.2021, *leg. E. Poirier*; 2 ♀, Grosseto-Prugna (2A130), Porticcio, Collège, 41°53'16.058"N, 8°48'35.701"E, 8 m, 21-22.IX.2021, *leg. C. Quindroit*.

Dicranomyia* (*Dicranomyia*) *ornata (Meigen, 1818)

Records of this species are old, and most of them identified before the description of *D. lucida*, in 1918. Data originate from Kuntze (1913; Schnuse collection) and from Lackschewitz (1928). Both the Wien Museum (Lackschewitz's collection) and Dresden Museum (Kuntze's collection) have been contacted in order to examine the specimens or compare the specimens on the basis of a picture of the wing, but we received no response so far. Moreover, *D. ornata* is very similar to *D. patricia* Starý, 1982, recorded from Italy, Portugal and Tunisia. So, in the present checklist, this species is considered as doubtful.

Dicranomyia* (*Dicranomyia*) *pallidinota Starý, 2009

Recorded from Corsica between 730 and 2,000 m, in deciduous forest (*Quercus, Castanea* or *Alnus* forest).

A single male was collected during the *Our Planet Reviewed in Corsica 2019-2021* expeditions, in a wet hole under a rock within a pine forest (with some deciduous trees) at 815 m.

Haute-Corse: 1 ♂, Olmi-Cappella (2B190), Tartagine, 41°53'16.058"N, 8°48'35.701"E, 815 m, 2.VII.2019, *leg. Claire Villemant*.

Lipsothrix remota (Walker, 1848)

This species is widely distributed in northern Europe, and common in suitable habitats. Larvae develop in semi-submerged decorticated wood in, or adjacent to, streams (Godfrey, 2003). During the *Our Planet Reviewed in Corsica 2019-2021* expeditions, two females were collected on a gravelly muddy seep in deciduous forest at 920 m. This represented the first record for the island (Kolcsár *et al.*, 2021). See in vivo specimen in fig. 7.

Corse-du-Sud: 2 ♀, Serra di Scopamène (2A278), Campu di Bonza (fig. 2), 41°46'21.5"N, 9°07'15.8"E, 920 m, 23-27.VI.2019, *leg. Marc Pollet*.

Rhipidia* (*Rhipidia*) *punctiplena Mik, 1887

A species first reported from France in 2021 (Labat, 2021) from the Central Massif region. This xylophilous species has a wide Western Palaearctic distribution. A single female was

collected at sea level, in a riparian undergrowth of *Alnus*, together with *Helius calviniensis,* yet unidentified *Paradelphomyia* specimens and *Dicranomyia lucida.*

Corse-du-Sud: 1 ♀, Grosseto-Prugna (2A130), Porticcio, Collège, 41°53'16.058''N, 8°48'35.701''E, 8 m, 22.IX.2021, *leg. C. Quindroit*.

Family **Pediciidae**

Subfamily **Pediciinae**

Dicranota* (*Ludicia*) *trifurcata (Edwards, 1928)

Corsican endemic. Found between 200 and 1,250 m, along streams in deciduous or coniferous forests and on low vegetation in marshy seeps and along muddy streams in fir forest.

Corse-du-Sud: 1 ♂, Evisa (2A108), chemin des Châtaigniers, along a stream in a mixed forest, 42°15'25.43''N, 8°48'55.803''E, 900 m, 10.IX.2020, *leg. C. Quindroit*; 2 ♀, Zonza (2A362), Samulaghia (fig. 4), 41°45'39.3"N,09°13'36.8"E, 1,243 m, 24.VI.2019 (MSW), *leg. Marc Pollet*.

Pedicia* (*Crunobia*) *zangheriana Nielsen, 1950

The current distribution range of this species is restricted, from the extreme southeast of France (Departments Alpes-de-Hautes-Provence and Alpes-Maritimes), central Italy (type locality), Sicily and Corsica. During the *Our Planet Reviewed in Corsica 2019-2021* expeditions, it has been encountered on dry rocks near seeps in a fir forest.

Corse-du-Sud: 1 ♂, Zonza (2A362), Samulaghia, 41°45.703'N, 09°13.649'E, 1,208 m, 24-28.VI.2019, *leg. Marc Pollet*.

Fig. 6-7. – **6**, *Dicranomyia* (*Dicranomyia*) *modesta* (Meigen, 1818), ♂, Entramme 10.V.2016. – **7**, *Lipsothrix remota* (Walker, 1848), ♂, Villepail, 3.VI.2022. *(Photos by C. Quindroit)*.

Discussion

At present, a total of 90 Limoniidae and 12 Pediciidae species have been reported from Corsica. Seven species are considered endemic to Corsica (*Dactylolabis anomala, D. nubeculosa, Eloeophila pusilla, Molophilus zonzensis, Rhypholophus dufouri, Hexatoma schnusei* and *Dicranota trifurcata*) and four are Corso-Sardinian endemics, i.e., *Dactylolabis corsicana, Rhabdomastix incapax, Eloeophila laciniata* and *Gonomyia theowaldi*. Endemic species thus currently represent about one tenth of the limoniid and pecidiid fauna of Corsica.

The Corsican cranefly fauna is still rather poorly known and there is no doubt that more species will be added over time. Only 27 species are known from Sardinia, but among them, six are still unknown from Corsica (though all six are widely distributed in Europe).

We can also note that, for now, several specimens collected during *Our Planet Reviewed in Corsica 2019-2021* expeditions, as well as by the first author, are yet unattributed to species level, possibly belonging to yet undescribed species —some *Pedicia* (*Crunobia*) and at least three species of *Tasiocera*. Therefore, these might be added to this list in the future.

There is also the possibility that some old species records are the result of misidentifications (with some similar species described later in time). Additional field inventories and the examination of collection material will reveal whether these species (e.g., *Dicranomyia ornata, Rhypholophus bifurcatus*) must ultimately be removed from Corsica's checklist or not.

The *Our Planet Reviewed in Corsica 2019-2021* expeditions, together with fieldwork by the first author in selected sites, produced 63 species, representing over 3/5 of the currently known Corsican fauna and including seven first records for the island, including two first records for France, and one species new to science. Undoubtedly, more species might have been collected if a limoniid-pediciid expert had been involved in the fieldwork during the three successive years. Nevertheless, these results underpin how important this type of inventory can be for the improvement of our knowledge on the known species as well as the discovery of new species to both the region and science.

Acknowledgements. – Most of the material treated during this study was collected during the naturalist expeditions *La Planète Revisitée* (*Our Planet Reviewed*) *en Corse 2019-2021*. This survey was organised by the Muséum national d'Histoire naturelle (MNHN, Paris) in collaboration with, and funded by, the Collectivité de Corse (CdC) and the Office Français de la Biodiversité (OFB). We are also grateful to our logistical partners who assisted with fieldwork in 2020: the Office de l'Environnement de la Corse (OCIC and CBNC), the Direction Régionale de l'Environnement de l'Aménagement et du Logement (DREAL) and the Conservatoire du Littoral (CdL). We are grateful for the financial support of the participation of Marc Pollet and Anja De Braekeleer to the field campaigns of 2019 and 2021. The work of J. Starý was financially supported by the Ministry of Culture of the Czech Republic by institutional financing of long-term conceptual development of the research institution (the Silesian Museum, MK000100595). We are indebted to the leaders of the expedition, Julien Touroult, François Dusoulier and Jean Ichter, for the thorough preparation and guidance. Thanks to Paul Beuk and Thibault Ramage for assistance in sample processing, and to Pierre Tillier for sharing the Limoniidae samples. We are also much indebted to Pjotr Oosterboek for comments upon the text.

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