

Dolichopodidae (incl. Microphorinae)

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Diagnosis: Minute to medium-sized brachycerous flies (1-10 mm), mostly with long and slender legs, conspicuously ornamented in males of multiple species. Body generally laterally flattened; body colour usually metallic green, but sometimes also mainly yellow or non-metallic brown to black. Face usually long, with short but protruding mouthparts. Antenna inserted on the upper part of the head, with distinct scape, pedicel and postpedicel; arista-like stylus bare, pubescent, plumose, or with an apical flag in only a few Palearctic species (*Sybistroma*). Hypopygium twisted (rotated and flexed) 180°, small and largely enclosed into the abdomen in some species, and, large, conspicuous, pedunculate and folded underneath the abdomen in other species. Wing venation similar throughout the family, reduced with small basal cells and large discal cell, delimited by crossvein dm-m. Vein M₂ mostly absent, except for representatives of the subfamily Sciapodinae and present as stubvein in some Dolichopodinae (see Pollet & Brooks 2008). Species of *Microphor*, *Schistostoma* and *Microphorella* have long been considered as representatives of a separate family, Microphoridae, also in the 1998 Checklist. The first two genera are currently assigned to Microphorinae and the third to Parathalassiinae, two subfamilies that have been added to Dolichopodidae (Sinclair & Cumming 2006; Pollet & Brooks 2008).

Biology: Adults and larvae are predaceous, and feed on small invertebrates (Ulrich 2004); only the larvae of *Thrypticus* are leaf-miners of monocotyledons (Dyte 1959). The immature stages live in moist substrates (mud, decaying vegetation, under tree bark). Adults can be found in almost all terrestrial habitats, but most species prefer humid biotopes. Some lineages such as *Medetera*, *Neurigona* and *Sciapus* are often found on vertical substrates such as tree trunks and walls (Pollet 2000).

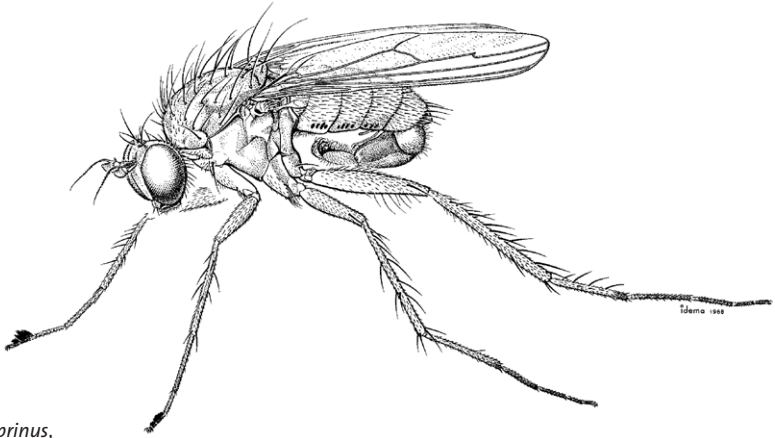
Nomenclature and classification: According to Yang et al. (2006), as implemented in Fauna Europaea (Pollet 2011).

Number of species: CH: 300 (1998 Checklist: 187 [180 +7]),

BE: 295, CZ: 324, DE: 424, DK: 297, ES: 207, FI: 260, HR: 94, IE: 160, IT: 292, NL: 264, PT: 200, SE: 345, SK: 238, UK: 308, Balkan Peninsula: 288, Europe: 791, World: > 8'000.

(BE: Pollet 2000, CZ: Pollet & Suvák 2009, DE: Meyer & Stark 2015, DK: Pollet & Petersen 2001, ES: Ventura et al. 2002, FI: Kahanpää 2014, HR: Pollet & Ivkovic 2018, IE: Chandler 2022, IT: Pesarini et al. 1995, NL: Pollet & Meuffels 2023, PT: Pollet et al. 2019, SE: Persson et al. 2019, SK: Pollet & Suvák 2009, UK: Chandler 2022, Balkan Peninsula: Kechev et al. 2020, Europe: Pollet 2011, World: Grichanov 2017)

Level of faunistic knowledge in Switzerland: Good; additional species recorded from adjacent countries probably also occur in Switzerland and a few new species await to be described.



Dolichopus cuprinus,
male, not present in Switzerland
(MND1, p. 625).

General references: Four comprehensive works: Parent (1938) [key continental Europe], d'Assis-Fonseca (1978) [key UK], the series by Stackelberg (1930, 1933, 1934, 1941), Negrobov & Stackelberg (1972, 1974a, b), and Negrobov (1977, 1978, 1979a, b) in *Die Fliegen der palaearktischen Region* [key (not all genera) Palaearctic region], Chvála (1983) [key Microphorinae]; and multiple papers dealing with separate genera like Pollet (1990) [key *Gymnopternus*], Pollet (1996) [key *Achalcus*], Pollet & Kechev (2007) [key *Teuchophorus*], Chandler & Negrobov (2008) [key *Xanthochlorus*], Pollet (2011) [Fauna Europaea, nomenclature], Grichanov et al. (2012) [key *Teuchophorus*], Grichanov & Negrobov (2014) [key *Sciapus*], Negrobov & Naglis (2016) [key *Medetera*].

References to the Swiss fauna: Ringdahl (1957), Basset (1985, 1986), Gonseth et al. (1985), Naglis (1997, 1998, 1999, 2009a, b, 2010, 2012a, 2012b, 2013a, b, 2014, 2015a, b), Naglis & Bernasconi (2014), Naglis & Negrobov (2014a, b), Artmann et al. (2003), Rampazzi (2002), Germann et al. (2009), German & Bernasconi (2010), Merz et al. (2012), Pollini Paltrinieri (2013).

Checklist

Achalcinae

Achalcus Loew, 1857

- *cinereus* (Haliday, 1851) !
- *flavicollis* (Meigen, 1824) !
- *nigropunctatus* Pollet & Brunhes, 1996 !
- *vallanti* Brunhes, 1987 !

Diaphorinae*Argyra* Macquart, 1834

- *argentina* (Meigen, 1824) L
- *argyria* (Meigen, 1824) !
- *atriceps* Loew, 1857 !
- *auricollis* (Meigen, 1824) L
- *diaphana* (Fabricius, 1775) !
- *discedens* Becker, 1907 !
- *elongata* (Zetterstedt, 1843) ! [1]
- *grata* Loew, 1857 !
- *hoffmeisteri* (Loew, 1850) ! [2]
- *ilonae* Gosseries, 1988 ! [3]
 - = *confinis* (Zetterstedt, 1849)
- *leucocephala* (Meigen, 1824) !
- *perplexa* Becker, 1918 !
- *vestita* (Wiedemann, 1817) !

Asyndetus Loew, 1869

- *latifrons* (Loew, 1857) !
- *varus* Loew, 1869 !

Chrysotus Meigen, 1824

- *alpicola* Strobl, 1893 ? N1
- *angulicornis* Kowarz, 1874 L
- *blepharosceles* Kowarz, 1874 !
- *cilipes* Meigen, 1824 !
- *collini* Parent, 1923 ! [4]
- *cupreus* (Macquart, 1827) !
- *dischmaensis* Naglis, 2010 !
- *femoratus* Zetterstedt, 1843 !
- *gramineus* (Fallén, 1823) !
 - = *microcerus* Kowarz, 1875
 - = *varians* Kowarz, 1875
- *laesus* (Wiedemann, 1817) !
- *monochaetus* Kowarz, 1874 !
- *neglectus* (Wiedemann, 1817) !
- *obscuripes* Zetterstedt, 1838 !
 - = *kowarzi* Lundbeck, 1912
- *pulchellus* Kowarz, 1874 !
- *suavis* Loew, 1857 !

Diaphorus Meigen, 1824

- *disjunctus* Loew, 1857 L
- *exunguiculatus* Parent, 1925 !
- *gredleri* Mik, 1881 !
- *halteralis* Loew, 1869 !
- *hoffmannseggii* Meigen, 1830 !
- *nigricans* Meigen, 1824 !
- *nigrotibia* Strobl, 1893 !

- = *oldenbergi* Parent, 1925
- *oculatus* (Fallén, 1823) !
- *vitripennis* Loew, 1859 ? N1
- *winthemi* Meigen, 1824 !

Melanostolus Kowarz, 1884

- *melancholicus* (Loew, 1869) !

Dolichopodinae*Dolichopus* Latreille, 1796

- *agilis* Meigen, 1824 ? N1
- *arbustorum* Stannius, 1831 !
- *argyrotarsis* Wahlberg, 1850 !
- *atratus* Meigen, 1824 !
- *atripes* Meigen, 1824 !
- *campestris* Meigen, 1824 ! [5]
- *claviger* Stannius, 1831 ! [6]
- *excisus* Loew, 1859 !
- *festivus* Haliday, 1832 !
- *flavipes* Stannius, 1831 ? N1
- *genicupallidus* Becker, 1889 !
- *griseipennis* Stannius, 1831 !
- *latilimbatus* Macquart, 1827 !
- *lepidus* Staeger, 1842 !
 - = *cruralis* Wahlberg, 1850
- *linearis* Meigen, 1824 !
- *longicornis* Stannius, 1831 ! [7]
- *longitarsis* Stannius, 1831 !
- *melanopus* Meigen, 1824 !
- *nigricornis* Meigen, 1824 !
 - = *discifer* Stannius, 1831
- *nitidus* Fallén, 1823 !
- *notatus* Staeger, 1842 ! [8]
- *nubilus* Meigen, 1824 !
- *pennatus* Meigen, 1824 !
- *picipes* Meigen, 1824 !
- *planitarsis* Fallén, 1823 !
- *plumipes* (Scopoli, 1763) !
- *plumitarsis* Fallén, 1823 ! [9]
- *popularis* Wiedemann, 1817 !
- *rupestris* Haliday, 1833 !
- *signatus* Meigen, 1824 ! [10]
- *signifer* Haliday, 1838 !
- *simplex* Meigen, 1824 !
- *stenhammari* Zetterstedt, 1843 !
 - = *annulipes* Zetterstedt, 1838
- *subpennatus* d'Assis Fonseca, 1976 ! [11]

- *tanythrix* Loew, 1869 !
- *trivialis* Haliday, 1832 !
- *ungulatus* (Linnaeus, 1758) !
- *urbanus* Meigen, 1824 !
- *vitripennis* Meigen, 1824 !
- *wahlbergi* Zetterstedt, 1843 ! [12]

Ethiomyia Brooks, 2005

- *chalybea* (Wiedemann, 1817) !
- = *Hercostomus chalybeus* (Wiedemann, 1817)

Gymnopternus Loew, 1857

- *aerosus* (Fallén, 1823) !
- = *Hercostomus aerosus* (Fallén, 1823)
- *angustifrons* (Staeger, 1842) !
- = *Hercostomus angustifrons* (Staeger, 1842)
- *assimilis* (Staeger, 1842) ! [13]
- = *Hercostomus assimilis* (Staeger, 1842)
- *blankaartensis* (Pollet, 1990) !
- = *Hercostomus blankaartensis* Pollet, 1990
- *brevicornis* (Staeger, 1842) !
- = *Hercostomus brevicornis* (Staeger, 1842)
- *celer* (Meigen, 1824) !
- = *Hercostomus celer* (Meigen, 1824)
- *cupreus* (Fallén, 1823) !
- = *Hercostomus cupreus* (Fallén, 1823)
- *helveticus* Pollet & Rampazzi, 2004 !
- *metallicus* (Stannius, 1831) !
- = *Hercostomus metallicus* (Stannius, 1831)
- *silvestris* (Pollet, 1990) !
- = *Hercostomus silvestris* Pollet, 1990

Hercostomus Loew, 1857

- *argentifrons* Oldenberg, 1916 !
- *chaerophylli* (Meigen, 1824) !
- = *conformis* (Loew, 1857)
- *chetifer* (Walker, 1849) !
- *exarticulatus* (Loew, 1857) !
- *fugax* (Loew, 1857) !
- *fulvicaudis* (Walker, 1851) !
- *germanus* (Wiedemann, 1817) !
- *gracilis* (Stannius, 1831) !
- = *bicolor* Macquart, 1827
- *labiatus* (Loew, 1871) !
- *longiventris* (Loew, 1857) ? N1
- *nanus* (Macquart, 1827) !
- *nigrilamellatus* (Macquart, 1827) !
- *nigriplantis* (Stannius, 1831) !
- *plagiatus* (Loew, 1857) !

- *pokorny* Mik, 1889 !
- *rogenhoferi* (Mik, 1878) !
- *rothi* (Zetterstedt, 1859) !
 - = *praeceps* Loew, 1869
- *rusticus* (Meigen, 1824) !
- *sahlbergi* (Zetterstedt, 1838) !
- *vivax* (Loew, 1857) !
- *vockerothi* d'Assis Fonseca, 1976 !

Poecilobothrus Mik, 1878

- *chrysozygos* (Wiedemann, 1817) !
- *nobilitatus* (Linnaeus, 1767) !

Sybistroma Meigen, 1824

- *crinipes* Staeger, 1842 ! [14]
- *discipes* (Germar, 1817) L
- *inornatus* (Loew, 1857) !
 - = *Hercostomus inornatus* (Loew, 1857)
- *nodicornis* Meigen, 1824 !
- *obscurellus* (Fallén, 1823) ! [15]
- *sphenopternus* (Loew, 1859) ! [16]

Tachytrechus Haliday, 1851

- *eucerus* Loew, 1869 !
- *genualis* Loew, 1857 !
- *notatus* (Stannius, 1831) L
- *ocior* Loew, 1869 !
- *transitorius* Becker, 1917 !

Hydrophorinae*Coracocephalus* Mik, 1892

- *stroblii* Mik, 1892 !

Diostracus Loew, 1861

- *argyrostomus* (Mik, 1874) !
 - = *Sphyrotarsus argyrostomus* Mik, 1874
- *hervebazini* (Parent, 1914) L
 - = *Sphyrotarsus herzebazini* Parent, 1914
- *hygrophilus* (Becker, 1891) ? N1
 - = *Sphyrotarsus hygrophilus* Becker, 1891
- *leucostomus* (Loew, 1861) ? N1

Eucoryphus Mik, 1869

- *brunneri* Mik, 1869 !
- *coeruleus* Becker, 1889 !

Hydrophorus Fallén, 1823

- *albiceps* Frey, 1915 !
- *balticus* (Meigen, 1824) ! [17]
- *bipunctatus* (Lehmann, 1822) L
- *borealis* Loew, 1857 !
- *nebulosus* Fallén, 1823 L

- *praecox* (Lehmann, 1822) !
- *rogenhoferi* Mik, 1874 !

Liancalus Loew, 1857

- *virens* (Scopoli, 1763) !

Peodes Loew, 1857

- *forcipatus* Loew, 1857 !

Medeterinae

Dolichophorus Lichtwardt, 1902

- *kerteszi* Lichtwardt, 1902 !

Medetera Fischer von Waldheim, 1819

- *abstrusa* Thuneberg, 1955 !
- *acanthura* Negrobov & Thuneberg, 1970 !
- *adjaniae* Gosseries, 1988 L
- = *breviseta* Parent, 1927
- *alpicola* Naglis & Negrobov, 2014 !
- *ambigua* (Zetterstedt, 1843) !
- *arrogans* (Parent, 1927) !
- *betulae* Ringdahl, 1949 ? N2
- *brevitarsa* Parent, 1927 ! [18]
- *caeruleifacies* Naglis & Negrobov, 2014 !
- *campestris* Naglis & Negrobov, 2014 !
- *curvipyga* Naglis & Negrobov, 2014 !
- *cuspidata* Collin, 1941 !
- *excellens* Frey, 1909 !
- *fasciata* Frey, 1915 ! [19]
- *glauca* Loew, 1869 !
- *gracilicauda* Parent, 1927 !
- *helvetica* Naglis & Negrobov, 2014 !
- *impigra* Collin, 1941 !
- *infumata* Loew, 1857 !
- *inspissata* Collin, 1952 !
- *jacula* (Fallén, 1823) !
- *jugalis* Collin, 1941 !
- *kerzhneri* Negrobov, 1966 !
- *kowarzi* Negrobov, 1974 !
- *lorea* Negrobov, 1967 !
- *melancholica* Lundbeck, 1912 ? N3
- *micacea* Loew, 1857 !
- *mixta* Negrobov, 1967 !
- *muralis* Meigen, 1824 !
- *nitida* (Macquart, 1834) !
- *pallipes* (Zetterstedt, 1843) !
- *parenti* Stackelberg, 1925 !
- *peloria* Negrobov, 1967 ! N4
- *petrophila* Kowarz, 1877 !

- *petrophiloides* Parent, 1925 !
- *pinicola* Kowarz, 1877 !
- *plumbella* Meigen, 1824 !
- *polonica* Negrobov & Capecki, 1977 !
- *prjachinae* Negrobov, 1974 ! [20]
- *saxatilis* Collin, 1941 ? N3
- *seguyi* Parent, 1926 ! [21]
- *setiventris* Thuneberg, 1955 ! [22]
- *signaticornis* Loew, 1857 !
- *takagii* Negrobov, 1970 ! [23]
- *thunebergi* Negrobov, 1967 !
- *ticinensis* Naglis & Negrobov, 2014 !
- *tristis* (Zetterstedt, 1838) !
- *truncorum* Meigen, 1824 !
- *unisetosa* Collin, 1941 !
- *vagans* Becker, 1917 ? N3
- *valaisensis* Naglis & Negrobov, 2014 !

Systemus Loew, 1857

- *leucurus* Loew, 1859 !
- *pallipes* (von Roser, 1840) !
- *tener* Loew, 1859 !

Thrypticus Gerstaecker, 1864

- *atomus* Frey, 1915 !
- *bellus* Loew, 1969 !
- *intercedens* Negrobov, 1967 !
- *smaragdinus* Gerstäcker, 1864 !

Microphorinae

Microphor Macquart, 1827

- *anomalus* (Meigen, 1824) !
- *crassipes* Macquart, 1827 !
- *holosericeus* (Meigen, 1804) !
- = *velutinus* Macquart, 1827
- *intermedius* (Collin, 1961) !
- *strobli* Chvála, 1986 !

Microphorella Becker, 1909

- *praecox* (Loew, 1864) !
- *similis* Brooks & Ulrich, 2012 !

Schistostoma Becker, 1902

- *truncatum* (Loew, 1864) !

Neurigoninae

Neurigona Rondani, 1856

- *abdominalis* (Fallén, 1823) !
- *cilipes* (Oldenberg, 1904) !
- *erichsoni* (Zetterstedt, 1843) !

- *pallida* (Fallén, 1823) !
- *quadrifasciata* (Fabricius, 1781) !
- *suturalis* (Fallén, 1823) !

Oncopygius Mik, 1866

- *distans* (Loew, 1857) !

Peloropeodinae

Acropsilus Mik, 1878

- *niger* (Loew, 1869) !

Chrysotimus Loew, 1857

- *flaviventris* (von Roser, 1840) !
- *molliculus* (Fallén, 1823) !

Micromorphus Mik, 1878

- *albipes* (Zetterstedt, 1843) ?
- *claripennis* (Strobl, 1899) !

Rhaphiinae

Nematoproctus Loew, 1857

- *distendens* (Meigen, 1824) !
- *praesectus* Loew, 1869 ! [24]

Rhaphium Meigen, 1803

- *albifrons* Zetterstedt, 1843 !
 - = *breviseta* (Becker, 1891)
- *albomaculatum* (Becker, 1891) !
- *appendiculatum* Zetterstedt, 1849 !
 - = *macrocerum* sensu Parent, 1938 nec Meigen, 1824
- *auctum* Loew, 1857 !
- *brevicorne* Curtis, 1835 !
- *caliginosum* Meigen, 1824 !
 - = *zetterstedti* (Parent, 1925)
- *commune* (Meigen, 1824) !
- *crassipes* (Meigen, 1824) !
- *ensicorne* Meigen, 1824 !
- *fasciatum* Meigen, 1824 !
- *fissum* Loew, 1850 !
- *fractum* Loew, 1850 !
- *gravipes* Haliday, 1851 ? N5
- *longicorne* (Fallén, 1823) !
- *micans* (Meigen, 1824) !
- *monotrichum* Loew, 1850 !
- *penicillatum* Loew, 1850 !
- *quadrispinosum* (Strobl, 1898) !
- *riparium* (Meigen, 1824) !
 - = *praerosum* Loew, 1850
- *rivale* (Loew, 1869) !
- *suave* (Loew, 1859) !

- *xiphias* Meigen, 1824 !

Sciapodinae

Sciapus Zeller, 1842

- *albifrons* (Meigen, 1830) !
- *basilicus* Meuffels & Grootaert, 1990 !
- *bellus* (Loew, 1873) !
- *evanidus* Bezzi, 1898 !
- *frater* (Parent, 1927) ?
- *gracilipes* (Loew, 1871) ! N6
- *heteropygus* Parent, 1926 !
- *longulus* (Fallén, 1823) !
- *nervosus* (Lehmann, 1822) !
- *pallens* Wiedemann, 1830 !
- *platypterus* (Fabricius, 1805) !
- *spiniger* (Zetterstedt, 1859) !
- *venetus* Meuffels, 1976 ! [25]
- *wiedemanni* (Fallén, 1823) !
- *zonatulus* (Zetterstedt, 1843) !

Sympycninae

Anepsiomyia Bezzi, 1902

- *flaviventris* (Meigen, 1824) !

Campsicnemus Haliday, 1851

- *alpinus* (Haliday, 1833) !
- *compeditus* Loew, 1857 !
- *curvipes* (Fallén, 1823) !
- *loripes* (Haliday, 1832) !
- *lumbatus* Loew, 1857 !
- *mamillatus* Mik, 1869 !
- *marginatus* Loew, 1857 !
- *scambus* (Fallén, 1823) !
- *simplicissimus* Strobl, 1906 !
- *umbripennis* Loew, 1856 !
- *varipes* Loew, 1859 !

Lamprochromus Mik, 1878

- *bifasciatus* (Macquart, 1827) !

Sympycnus Loew, 1857

- *aeneicoxa* (Meigen, 1824) !
- *brevimanus* Loew, 1857 L
- *cirripes* (Haliday, 1851) !
= *cirrhipes* auct.
- *kowarzi* Parent, 1925 !
- *pulicarius* Fallén, 1823 !
= *annulipes* (Meigen, 1824)
= *desoutteri* Parent, 1925

- *spiculatus* Gerstäcker, 1864 !
- *strobl*i Parent, 1927 !

Syntormon Loew, 1857

- *bicolorellum* (Zetterstedt, 1843) !
- *denticulatum* (Zetterstedt, 1843) !
- *macula* Oldenberg, 1927 ! [26]
- *metathesis* (Loew, 1850) !
 - = *dobrogicus* Pärnu, 1985
- *monile* (Haliday in Walker, 1851) ? N7
- *pallipes* (Fabricius, 1794) !
- *sulcipes* (Meigen, 1824) !
- *zelleri* (Loew, 1850) L

Teuchophorus Loew, 1857

- *calcaratus* (Macquart, 1827) !
- *monacanthus* Loew, 1859 !
- *nigricosta* (von Roser, 1840) !
 - = *signatus* (Zetterstedt, 1849)
- *simplex* Mik, 1880 !
- *spinigerellus* (Zetterstedt, 1843) !

Xanthochlorinae

Xanthochlorus Loew, 1857

- *galbanus* Chandler & Negrobov, 2008 !
- *ornatus* (Haliday, 1832) !
- *tenellus* (Wiedemann, 1817) ? N8

Notes

- N1 *Chrysotus alpicola*, *Diaphorus vitripennis*, *Dolichopous agilis*, *Dolichopus flavipes*, *Hercostomus longiventris*, *Diostracus hygrophilus*, *Diostracus leucostomus*: doubtful presence as only mentioned in the Catalogue of Palaearctic Diptera (Negrobov 1991).
- N2 *Medetera betulae*: doubtful presence. Naglis (2015) states: «The record of *M. betulae* from Switzerland (Basset, 1985) probably refers to *M. campestris* Naglis & Negrobov, 2014».
- N3 *Medetera melancholica*, *M. saxatilis*, *M. vagans*: presence doubtful until confirmed by specimens.
- N4 Naglis (2015) believed that the reported individuals of *Medetera peloria* belonged in reality to *M. muralis*, as records of the former species were only known from Russia. We can confirm that Naglis' assumption was incorrect based on new material that unequivocally belongs to *M. peloria*.
- N5 *Rhaphium gravipes*: doubtful species; the only specimen seen was a female doubtfully considered as *R. gravipes*; this species needs to be confirmed with male specimens in the future.
- N6 *Sciapus gracilipes*: the record from Switzerland (Bächli et al. 2014) is doubtful, since it is based on a female; this species needs to be confirmed with male specimens in the future.
- N7 Naglis (1999) recorded *Syntormon monile* from Switzerland for the first time. As this is a species that is mainly encountered in coastal areas (Drake 2021, Pollet & Grootaert 2023), the Swiss records might rather refer to the related *S. submonilis* Negrobov, 1975. Moreover, both in the UK (Drake 2021) and Belgium (Pollet & Grootaert 2023), the latter species is considerably more common than *S. monile*. Unfortunately, Swiss material of this species has not been available for study thus far.
- N8 *Xanthochlorus tenellus*: doubtful species until a specimen is checked on the basis of the identification key in Chandler & Negrobov (2008).

Species records

- [1] 8M, 3F, FR, Châbles, Rive sud Lac de Neuchâtel, 31.5.1997, 430 m., leg. Association de la Grande Cariçaie (MCSN)
- [2] 2M, FR, Châbles, Rive sud Lac de Neuchâtel, 15-17.5.1997, 430 m., leg. Association de la Grande Cariçaie (MCSN)
- [3] 1F, JU, Courendlin, Le Tayment, Brise, 12.8.1988, 420 m., leg. Yves Gonth (MHNN)
- [4] 12M, GE, Chêne-Bourg, « Grojean », Campo di cavolfiori, 14.7.1997, 420 m., leg. Agroscope, Changins-Wädenswil,
- [5] 1M, 1F, TI, Prugiasco, 7.6.2000, 561 m., leg. Anne-Sophie Genini (-Gamboni) (MCSN)
- [6] 4M, 2F, TI, Prugiasco, 20.5.2000, 561 m., leg. Anne-Sophie Genini (-Gamboni) (MCSN)
- [7] 1M, 1F, TI, Biasca Visnon, 6.5.2009, 306 m., leg. Valeria Trivellone (MCSN)
- [8] 1M, NE, Les Bayards, 7.1871, leg. Edouard Piaget (MHNN)
- [9] 2M, NE, Les Bayards, 7.1871, leg. Edouard Piaget (MHNN)
- [10] 1F, NE, Les Ponts-de-Martel, 13.6.1981, leg. Jean-Paul Haenni (MHNN)
- [11] 1M, AI, Weissbad, 11.7.1874, leg. Moritz Isenschmid (NMBE)
- [12] 1M, JU, Chevenez, La Genevroie, 28.6.1988, 530 m., leg. Yves Gonth (MHNN)
- [13] 2M, FR, Châbles, Rive sud Lac de Neuchâtel, 31.5.1997, 430 m., leg. Association de la Grande Cariçaie (MCSN)
- [14] 7M, FR, Châbles, Rive sud Lac de Neuchâtel, 31.5.1997, 430 m., leg. Association de la Grande Cariçaie (MCSN)
- [15] 1M, TI, Lottigna, 24.6.2000, 561 m., leg. Anne-Sophie Genini (-Gamboni) (MCSN)
- [16] 1F, TI, Bodio, 2.8.1988, leg. Jean-Paul Haenni (MHNN)
- [17] 2F, NE, Les Verrières, 8.1872, leg. Edouard Piaget (MHNN)
- [18] 2M, 1F, ZH, Steg, Tössstock, 16.5.2002, 1000 m., leg. Christian Epper (WSL)
- [19] 3M, 1F, VS, Stalden, 23.4.2004, 900 m., leg. WSL (WSL)
- [20] 2M, LU, Rothenburg, 30.4.2003, leg. Christian Epper (WSL)
- [21] ZH, Sihlwald, 1996, leg. Karin Schiegg (WSL)
- [22] 1M, 3F, ZH, Steg, Tössstock, 23.5.2002, 1000 m., leg. Christian Epper (WSL)
- [23] 12M, 11F, GL, Schwanden, 16.6.1999, leg. Beat Wermelinger (WSL)
- [24] 1M, BE, Burgdorf, 14.5., leg. Rudolf Ludwig Meyer-Dür (NMBE)
- [25] 1M, TI, Prugiasco, progetto Deflussi minimi, Prateria xerica, 16.7.2000, 561 m., leg. Anne-Sophie Genini (-Gamboni) (MCSN)
- [26] 1F, VD, Cheseaux-Noréaz, Rive sud Lac de Neuchâtel, 17-22.4.1997, 430 m., leg. Association de la Grande Cariçaie (MCSN)

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