**Table S1.** Taxa under study, detail of authority and sampling location

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| **Accession number/**  **scaffold** | **Family**  **(class for outgroup)** | **Species** | **Authority** | **Sampling Location** |
| NC\_039558.1 | Bourletiellidae | *Bourletiella arvalis* | Fitch, 1862 | Monsindoli, Siena, Italy |
| MG701393 | Dicyrtomidae | *Dicyrtomina saundersi* | (Lubbock, 1862) Stach 1922 | Castello di Belcaro, Siena, Italy |
| s6802 | Dicyrtomidae | gen. sp. |  | Unknown1 |
| NC\_010534.1 | Entomobryidae | *Orchesella villosa* | (Linnaeus, 1767) Maynard, 1951 | Italy |
| NC\_032283 | Entomobryidae | *Orchesella cincta* | (Linnaeus, 1758) Russel, 2008 | The Netherlands |
| s6241 | Hypogastruridae | gen. sp. |  | Unknown1 |
| NC\_005438 | Hypogastrurudae | *Gomphiocephalus hodgsoni* | (Carpenter, 1908) Fiera, 2013 | Victoria Land, Antarctica |
| NC\_010533.1 | Isotomidae | *Cryptopygus antarcticus* | Willem, 1901 | Antarctic Peninsula, Killingbeck Is. |
| NC\_024155.1 | Isotomidae | *Folsomotoma octooculata* | (Willem, 1901) Potapov, 2001 | Antarctic Peninsula, Devils Point – Livingston Is. |
| KU198392 | Isotomidae | *Folsomia candida* | Willem, 1902 | The Netherlands |
| NC\_037610.1 | Isotomidae | *Cryptopygus terranovus* | (Wise, 1967) Greenslade, 2015 | Victoria Land, Emerging Is. |
| s6653 | Isotomidae | *Folsomia candida* | Willem, 1902 | Unknown1 |
| s8783 | Isotomidae | *Parisotoma notabilis* L1 | (Schäffer, 1896) Bagnall, 1940 | Unknown1 |
| s5537 | Isotomidae | *Parisotoma notabilis* L2 | (Schäffer, 1896) Bagnall, 1940 | Unknown1 |
| s7289 | Isotomidae | *Desoria trispinata* | (Mac Gillivray, 1896) Thibaud, 1977 | Unknown1 |
| s6464 | Lepidocyrtinae | *Lepidocyrtus curvicollis* | Bourlet, 1839 | Unknown1 |
| NC\_010535.1 | Neanuridae | *Friesea antarctica* AP | Greenslade, 2018 | Antarctic Peninsula, Hannah Point – Livingston Is. |
| EU124719.1 | Neanuridae | *Friesea antarctica* VL | Greenslade, 2018 | Victoria Land, Kay Is. |
| NC\_011195.1 | Neanuridae | *Bilobella aurantiaca* | (Caroli, 1912) Stach, 1951 | Italy |
| MH155200 | Neelidae | *Neelus murinus* | Folsom, 1896 | Castello di Belcaro, Siena |
| s6565 | Neelidae | *Megalothorax minimus* | (Willem, 1900) Fjellberg, 2007 | Unknown1 |
| s7305 | Neelidae | gen. sp. |  | Unknown1 |
| NC\_002735.1 | Onychiuridae | *Tetrodontophora bielanensis* | (Waga, 1842) Absolon 1901 | Passo San Boldo, Italy |
| NC\_006074.1 | Onychiuridae | *Onychiurus orientalis* | (Martynova, 1976) Pomorski, 2002 | Shanghai Botanical Garden |
| s6480 | Onychiuridae | *Deuteraphorura* sp. | Absolon, 1901 | Unknown1 |
| s6543 | Onychiuridae | *Thalassophorura* sp. | Bagnall, 1949 | Unknown1 |
| s6532 | Onychiuridae | gen. sp. |  | Unknown1 |
| s6379 | Onychiuridae | gen. sp. |  | Unknown1 |
| NC\_006075.1 | Poduridae | *Podura aquatica* | Linnaeus, 1758 | Shanghai Botanical Garden |
| NC\_010536.1 | Sminthuridae | *Sminthurus viridis* | (Linnaeus, 1758) Bourlet, 1843 | Siena, Italy |
| s7124 | Tullbergiidae | gen. sp. |  | Unknown1 |
| NC\_000844 | Branchiopoda | *Daphnia pulex* | Leydig, 1860 | Unknown |
| NC\_007214 | Diplura | *Japyx solifugus* | Haliday, 1864 | Castello di Belcaro, Siena, Italy |
| NC\_010532 | Microcoryphia | *Trigoniophthalmus alternatus* | Silvestri, 1904 | Siena, Italy |

1 The soil samples for the metagenomic analyses were collected from Tenerife (Canary Islands), Terceira (Azores) and Réunion (Mascarene Islands); therefore, the species, whose mtDNA is herein included in the data sets, may have been found in one or more of these sampling sites.