Protura of the Arctic region

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Protura, known as coneheads, are among the smallest of soil-dwelling microarthropods. These hexapods are wingless, eyeless, and have slender elongate bodies ranging between 0.7–2 mm. Due to their minuteness and cryptic edaphic lifestyle, they are easily overlooked and were discovered relatively late in the history of entomology. Protura are widespread but their distribution seems to be limited only by the presence of sufficient moisture levels and the availability of decaying organic matter. Some authors have pointed to the general lack of proturans in polar regions and nival zones of high mountains. Presence of Protura in Arctic region was first noted only ca.70 years ago and is still little acknowledged. Currently this fauna is represented by 23 species in two orders and 14 genera. The large cosmopolitan genus *Eosentomon* Berlese, 1908 is represented by only four species, whereas Acerentomidae is much more diverse, with 13 genera (eight Nipponentominae, five Acerentominae). Most of the species possess a larger number of body setae than more temperate species, including recently described genus, *Mastodonentomon* Shrubovych, 2020*,* which was created for *Nipponentomon macleani* (Nosek, 1977)*,* recordered from Alaska, Mastodon Dome at Eagle Creek*.* The genus *Mastodonentomon is b*ased on several unique characters, one of them is presence of three pairs of median setae on metanotum as opposed to other Protura species. Recent description of *Nienna chukotka* Shrubovych, 2019 from northern Chukotka above 69°N and a new record of *Yamatentomon yamato* (Imadaté and Yosii, 1956) from northern Yakutia above 72°N (Siberia), are currently the northernmost known Palearctic localities of Protura. Proturan occurrence in the Arctic is limited to Beringia, but the majority of species have restricted distributions and none has been found in both the American Arctic and Siberia, implying relict origins and potentially high levels of proturan endemism in the Arctic. This emerging view on biogeographical history is, however, hampered by the limited extent of available data, highlighting the need for considerably greater survey efforts.