

Revision of the genus *Rohdendorfia* Smirnov, 1924 (Diptera, Syrphidae)

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The Palaearctic genus *Rohdendorfia* is revised. Three species names are valid: *R. alpina* Sack, 1938, *R. dimorpha* Smirnov, 1924 and *R. montivaga* Violovitsh, 1984. *R. bactriana* Violovitsh, 1984 is a junior synonym of *dimorpha*, **syn. nov.** New material gives a better understanding of the distribution of this high alpine genus.

Key words: *Rohdendorfia*, revision, key, Syrphidae.

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Introduction

Genus *Rohdendorfia* Smirnov, 1924 comprises a small group of species confined to the Old World. The species have great similarity to species of the genera *Platycheirus* Le Peletier & Serville, 1828 and *Melanostoma* Schiner, 1860. They differ, however, in a coarsely punctured frons, scutum and scutellum, the central part of occiput is very broad, and the ocellar triangle more removed from the occiput. The profile of face is rather “nosy”, and the face widening downwards in the male. Abdomen is rather short, broad and flat, with large yellowish markings.

At present three species are known; *R. alpina* Sack, 1938, *R. dimorpha* Smirnov, 1924 and *R. montivaga* Violovitsh, 1984, see key below. *R. hedickei* Reinig, 1935 is a junior synonym of *Spazigaster ambulans* (Fabricius, 1798), see Claussen 1988.

The interest in this genus may be caused by the small number of specimens in collections and museums, due to difficulties in achieving material of these high alpine species. However, a special study program of the high mountain

fauna of northern Asia, started by Zoological Museum, Novosibirsk (ZMN), helped us to collect a rich material and made it possible to compare specimens from different parts of Asia and northern Caucasus.

As mentioned *Rohdendorfia* species have great similarity to *Platycheirus*, and Thompson and Rotheray (1998) regard *Rohdendorfia* as a subgenus of *Platycheirus*. In a recent paper by Mengual et al. (2008) two representatives of *Rohdendorfia* were included in a recent molecular phylogeny of Syrphinae. This study placed *Rohdendorfia* as sister to *Spazigaster* + *Syrphocheilosia*, and *Pyrophaena* as sister to all these.

Material and methods

It appears from previous studies on *Rohdendorfia* (Stackelberg 1965, Violovitsh 1984 and Claussen 1988) that the species are rare in nature. This impression was also in our minds before ZMN began its special study of high mountain biocoenosis in Altai and Middle Asia. It appeared,