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## ***Reduvius frommeri*, a new species of Reduviidae from the Western United States (Hemiptera: Reduviidae), with a synopsis of the Nearctic species of *Reduvius* Fabricius**

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### **Abstract**

The rate of discovery of new species of Reduviidae (Insecta: Heteroptera) from North America has slowed in the 21<sup>st</sup> century. This is not surprising, given the conspicuousness and large distribution ranges of many Nearctic assassin bug species that are often collected using general insect collecting techniques. Nevertheless, biodiversity discovery in Nearctic Reduviidae is ongoing. We here describe a new species, *Reduvius frommeri*, n. sp., from Southern California that is so far only known from a small endemic range in the Sonoran Desert. With about 197 species, the genus *Reduvius* Fabricius is one of the most speciose genera of Reduviidae. The majority of species occur in arid- and semi-arid areas in the Afrotropical, Oriental, and Palearctic regions and only three species are New World endemics. A fourth species that occurs in the United States, *Reduvius personatus* Fabricius, is cosmopolitan and has been introduced to the Western Nearctic. The new species of *Reduvius* stands out amongst the four other Nearctic *Reduvius* species by the small size and pale body coloration with a contrasting dark head. Image plates documenting habitus and selected morphological details and maps are provided for the five species in the Nearctic. We conclude that efforts to document species diversity and distribution ranges even for conspicuous insects such as assassin bugs in fairly well studied biogeographic regions need to continue.

**Key words:** Reduviinae, key, species description, diagnosis

### **Introduction**

A significant proportion of species of Reduviidae (Hemiptera: Heteroptera) described during the early 19<sup>th</sup> century were classified within the type genus of the family, the genus *Reduvius* Fabricius, 1775. The majority of these species, described among others by Fabricius (1803), Lethierry and Severin (1893–1896), Say (1832), and later Walker (1873), have since been moved to other genera and often even other subfamilies. With about 197 described species, *Reduvius* nevertheless remains one of the most speciose genera of assassin bugs worldwide (Maldonado 1990). The currently accepted, narrower concept of *Reduvius* was largely developed by Reuter (1893), who provided a revised description of the genus and in his monograph treated 38 Palearctic, Afrotropical, and Oriental species. Subsequent publications by various authors, including Distant (1904), Van Duzee (1906), China (1925), Hesse (1925), Schouteden (1931), Kiritshenko (1938), and Usinger (1942), contained descriptions of single or few species. Studies by Villiers (1948) and Miller (1951; 1955) added the bulk of additional species, followed by somewhat more scattered descriptions during the second half of the 20<sup>th</sup> century (Dispons 1965; Hsiao 1976; Linnauvouri 1974). Miller (1951) suggested that the genus should be subdivided into species groups. He then named and diagnosed, mostly based on color characters, eight species groups (Miller 1955), but did not classify the two endemic Nearctic species that were known at that point. Wygodzinsky and Usinger (1964) described a third species endemic to the Nearctic region, keyed the Nearctic species, placed the three endemic Nearctic species in the *senilis* species group, and diagnosed that group. Cai and Shen (1997) revised the Chinese species of *Reduvius* and provided an updated diagnosis for the genus.