

Type material of spiders (Chelicerata: Araneae) collected on the Michaelsen and Hartmeyer Expedition of 1905 and lodged in the Western Australian Museum

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Abstract

Those type specimens of spiders (Araneae) collected in south-western Australia during an expedition of the Berlin and Hamburg Museums led by W. Michaelsen and R. Hartmeyer in 1905 and subsequently lodged in the Western Australian Museum are listed. The current type status of the 42 specimens is discussed.

Introduction

Spiders collected by the Michaelsen and Hartmeyer Expedition to south-western Australia in 1905 were described by Simon (1908, 1909). In this work, some 228 species, including 160 new species (five of these from outside the region) and 121 genera, of which 21 were new, were recorded by Simon. At the time, this represented the most comprehensive regional collection of spiders made from anywhere within Australia. The specimens were distributed between the Muséum National d'Histoire Naturelle, Paris (MNHP), the Zoologisches Staatsinstitut und Zoologisches Museum, Hamburg (ZMH), the Institut für Zoologie und Zoologisches Museum, Berlin (ZMB) and the Western Australian Museum, Perth (WAM).

The specimens in the European museums have subsequently been the source of further taxonomic records but those in the Western Australian Museum have not been cited apart from brief references by McKay (1973, 1985) and Main (1982, 1985), probably because most workers have been unaware of their existence.

Simon did not designate primary types and for most species he cited several localities. However, several later workers have assigned particular type status to specimens of some species, but without reference to those specimens in the Western Australian Museum. These specimens, although originally in alcohol, were unfortunately at an early date pinned and/or glued on cards. Original labels were retained, including identification labels in Simon's handwriting. In 1980, one of us (BYM) returned the specimens to alcohol with all labels, including the WAM registration labels.

The collection contains 42 type specimens of 41 species, comprising 39 syntypes (38 species) and three paralectotypes. The specimens consist of 10 adult females (including a paralectotype for each of two species), three adult males, and 29 juveniles (including a paralectotype of one species).

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The order of families follows Platnick (1989, 1990). The families, subfamilies and tribes adopted by Simon (1908, 1909) are given in brackets after the citation. Simon's original spellings and combinations are followed in the species list. The station numbers employed by Michaelsen and Hartmeyer are listed in parentheses for each locality.

Systematics

Nemesiidae

***Proshermacha subarmata* Simon**

Proshermacha subarmata Simon, 1908: 364 (Aviculariidae: Ctenizinae: Nemesieae).

Paralectotype

1 immature, Wooroloo (Stat. 98), WAM 11/4272.

Remarks

This species is now regarded as a junior synonym of *Chenistonia tepperi* Hogg (Main 1982, 1985). Lectotype and paralectotype were designated by Main (1985).

Segestriidae

***Ariadna thyrianthina* Simon**

Ariadna thyrianthina Simon, 1908: 380 (Dysderidae).

Syntype

1 ♀, Norseman (Stat. 90), WAM 11/4268.

Hersiliidae

***Tama brachyura* Simon**

Tama brachyura Simon, 1908: 406 (Hersiliidae).

Syntype

1 immature, Geraldton (Stat. 75), WAM 11/4262.

Remarks

This species was designated as a nomen dubium by Baehr and Baehr (1987).

Theridiidae

***Billima attrita* Simon**

Billima attrita Simon, 1908: 430 (Argiopidae: Argiopinae: Theridiosomateae).

Paralectotype

1 ♀, Subiaco North (Stat. 109), WAM 11/4280.

Remarks

Levi (1967) transferred this species to *Theridion*, and designated a female lectotype. The WAM specimen is therefore a paralectotype.

***Enoplognatha bidens* Simon**

Enoplognatha bidens Simon, 1908: 414 (Theridiidae: Asageneae).

Syntype

1 ♀, Fremantle (Stat. 117), WAM 11/4294.

***Theridion mortuale* Simon**

Theridion mortuale Simon, 1908: 409 (Theridiidae: Theridieae).

Syntype

1 ♂ immature, Collie (Stat. 137), WAM 11/4267.

Linyphiidae

***Linyphia cupidinea* Simon**

Linyphia cupidinea Simon, 1908: 417 (Argiopidae: Linyphiinae: Linyphieae).

Paralectotype

1 ♀, Subiaco North (Stat. 109), WAM 11/4277.

Remarks

A male lectotype was selected by van Helsdingen (1972), which automatically makes the WAM specimen a paralectotype. Van Helsdingen (1972) transferred the species to *Laperousea* and Millidge (1988) synonymised it with *Laperousea blattifera* (Urquhart).

Tetragnathidae

***Nanometa gentilis* Simon**

Nanometa gentilis Simon, 1908: 421 (Argiopidae: Tetragnathinae).

Syntype

1 ♀, Lion Mill (Stat. 100), WAM 11/4287.

***Tetragnatha luteocincta* Simon**

Tetragnatha luteo-cincta Simon, 1908: 420 (Argiopidae: Tetragnathinae).

Syntype

1 immature, Midland (Stat. 102), WAM 11/4292.

***Tetragnatha maeandrata* Simon**

Tetragnatha maeandrata Simon, 1908: 421 (Argiopidae: Tetragnathinae).

Syntype

1 immature, Serpentine (Stat. 131), WAM 11/4292a.

Araneidae

***Araneus cyphoxis* Simon**

Araneus cyphoxis Simon, 1908: 426 (Argiopidae: Argiopinae: Araneae).

Syntype

1 immature, Perth (Stat. 105), WAM 11/4285.

***Araneus senicaudatus* Simon**

Araneus senicaudatus Simon, 1908: 425 (Argiopidae: Argiopinae: Araneae).

Syntype

1 immature, Serpentine (Stat. 131), WAM 11/4265.

Remarks

This specimen is probably *Eriophora pustulosa* (Walckenaer).

***Araneus senicaudatus simplex* Simon**

Araneus senicaudatus simplex Simon, 1908: 426 (Argiopidae: Argiopinae: Araneae).

Syntype

1 immature, Brunswick (Stat. 139), WAM 11/4289.

Lycosidae

***Lycosa meracula* Simon**

Lycosa meracula Simon, 1909: 190 (Lycosidae).

Syntype

1 immature, Denham (Stat. 65), WAM 11/4303.

Remarks

Rack (1961) and McKay (1985) regarded specimens in ZMH and WAM, respectively, as paratypes. Another specimen is lodged in MNHP. Since Simon never designated holotypes, all specimens are syntypes.

***Lycosa phegeia* Simon**

Lycosa phegeia Simon, 1909: 189 (Lycosidae).

Syntype

1 immature, Cannington (Stat. 123), WAM 11/4301.

Remarks

This species is now referred to as *Trochosa tristicula phegeia* (Simon) (McKay 1979). Rack (1961) listed a "♀ paratypoid" in ZMH; however, this is a syntype. Rack (1961) placed the species in *Triccosta*. There are also syntypes in MNHP and ZMB. Simon (1909) listed only one locality and described a male and female.

***Lycosa propitia* Simon**

Lycosa propitia Simon, 1909: 186 (Lycosidae).

Syntype

1 immature ♂, Cannington (Stat. 123), WAM 11/4302.

Remarks

Rack (1961) cited a "holotype" ♀ in ZMH. However, there are specimens in MNHP, ZMB and WAM, all from Cannington, which are regarded as syntypes.

***Lycosa woodwardi* Simon**

Lycosa woodwardi Simon, 1909: 182 (Lycosidae).

Syntype

1 ♀, Dongarra (Stat. 83), WAM 11/4300.

Desidae

***Amaurobius microps* Simon**

Amaurobius microps Simon, 1908: 366 (Dictynidae; misspelt as Dictyonidae throughout the text, but not in the index).

Syntype

1 immature, Albany (Stat. 165), WAM 11/4274.

Remarks

Transferred to *Badumna* Thorell by Lehtinen (1967).

***Aphyctoschaema armigerum* Simon**

Aphyctoschaema armigerum Simon, 1908: 370 (Dictynidae).

Syntype

1 immature ♂, Watheroo (Stat. 87), WAM 11/4276.

Remarks

This species is now placed in the genus *Forsterina* Lehtinen (Lehtinen 1967).

***Aphyctoschaema vultuosum* Simon**

Aphyctoschaema vultuosum Simon, 1908: 373 (Dictynidae).

Syntype

1 ♀, Mundaring Weir (Stat. 101), WAM 11/4275.

Remarks

This specimen is clearly labelled "Mundaring Weir (Stat. 101)", however, Simon (1908) did not record *A. vultuosum* from this locality. Nevertheless, the specimen is treated as a syntype. *Aphyctoschaema vultuosum* is now placed in the genus *Forsterina* Lehtinen (Lehtinen 1967).

***Callevophthalmus lividus* Simon**

Callevophthalmus lividus Simon, 1908: 378 (Dictynidae).

Syntype

1 ♂, East Fremantle (Stat. 116), WAM 11/4290.

Remarks

Lehtinen (1967) synonymised *C. lividus* with the type species of *Callevophthalmus*, *Lathys albus* Keyserling from New South Wales. If this synonymy is upheld, then the valid name for *C. lividus* is *C. albus*. Rack (1961) listed one ♂ male syntype in ZMH which is in fact a juvenile ♂ (M.R. Gray, pers. comm.).

***Desis hartmeyeri* Simon**

Desis hartmeyeri Simon, 1909: 180 (Agelenidae: Cybaeinae).

Syntype

1 immature, Albany (Stat. 165), WAM 11/4320.

Remarks

Rack (1961) cited a juvenile female in ZMH as "holotype". However, there are syntypes in ZMB and WAM.

***Phryganoporus gausapatus occidentalis* Simon**

Phryganoporus gausapatus occidentalis Simon, 1908: 367 (Dictynidae).

Syntype

1 immature, East Cannington (Stat. 125), WAM 11/4269.

Remarks

This species was transferred to *Badumna* and synonymised with *B. candida* (L. Koch) by Gray (1982).

***Phryganoporus tubicola* Simon**

Phryganoporus tubicola Simon, 1908: 367 (Dictynidae)

Syntypes

1 immature ♂, 1 immature ♀, Denham (Stat. 65), WAM 11/4279, 4279a.

Remarks

This species was synonymised with *Badumna candida* (L. Koch) by Gray (1982).

Stiphidiidae

***Epimecinus volucripes* Simon**

Epimecinus volucripes Simon, 1908: 377 (Dictynidae).

Syntype

1 immature, Bunbury (Stat. 142), WAM 11/4281.

Remarks

This species is the type species of *Baiami* Lehtinen (Lehtinen 1967).

Miturgidae

***Miturga catograpt* Simon**

Miturga catograpt Simon, 1909: 170 (Clubionidae: Cteninae: Miturgeae).

Syntype

1 immature, Lion Mill (Stat. 99), WAM 11/4307.

***Miturga occidentalis* Simon**

Miturga occidentalis Simon, 1909: 169 (Clubionidae: Cteninae: Miturgeae).

Syntype

1 ♀, Tamala (Stat. 70), WAM 11/4308.

Clubionidae

***Chiracanthium nervosum* Simon**

Chiracanthium nervosum Simon, 1909: 161 (Clubionidae: Clubioninae).

Syntype

1 immature, North Fremantle (Stat. 115), WAM 11/4317.

Remarks

The current spelling of the generic name is *Cheiracanthium* C.L. Koch (Platnick 1989).

***Clubiona laudabilis* Simon**

Clubiona laudabilis Simon, 1909: 161 (Clubionidae: Clubioninae).

Syntype

1 immature, Denham (Stat. 65), WAM 11/4318.

Remarks

Rack (1961) cited a ♀ holotype in ZMH; however, the specimen is an immature (B. Y. Main, personal observation) and as additional specimens are lodged in MNHP, ZMB and WAM, all are syntypes.

Zodariidae

***Storena tricolor* Simon**

Storena tricolor Simon, 1908: 405 (Zodariidae).

Syntype

1 immature, Lion Mill (Stat. 99), WAM 11/4286.

Corinnidae

***Aristerus phaleratus* Simon**

Aristerus phaleratus Simon, 1909: 179 (Clubionidae: Corinninae).

Syntype

1 ♂, Yalgoo (Stat. 77), WAM 11/4312.

Remarks

Platnick (1989) tacitly accepted Simon's placement of *Aristerus* in the Corinninae, which has since been elevated to family level. *Aristerus* may be better placed in the Gnaphosidae.

Gnaphosidae

***Corimaethes campestratus* Simon**

Corimaethes campestratus Simon, 1908: 385 (Drassidae: Hemicloeiinae).

Syntype

1 immature, Day Dawn (Stat. 76), WAM 11/4273.

Remarks

Rack (1961) listed a holotype in ZMH. However, since there are also specimens in MNHP, ZMB and WAM, all specimens are syntypes.

***Drassodes respersus* Simon**

Drassodes respersus Simon, 1908: 387 (Drassidae: Drassodinae).

Syntype

1 ♀, Northampton (Stat. 71), WAM 11/4282.

Remarks

This species was correctly transferred to *Anzacia* Dalmas by Roewer (1954). Rack (1961) listed the ZMH ♂ as holotype. However, specimens are deposited in MNHP, ZMB and WAM, and all are syntypes.

***Hemicloea insidiosa* Simon**

Hemicloea insidiosa Simon, 1908: 382 (Drassidae: Hemicloeiinae).

Syntype

1 immature ♂, East Fremantle, Recreation Ground (Stat. 116), WAM 11/4306.

***Hemicloea sublimbata* Simon**

Hemicloea sublimbata Simon, 1908: 383 (Drassidae: Hemicloeiinae).

Syntype

1 ♀, Kalgoorlie (Stat. 93), WAM 11/4263.

***Megamyrmaecion penicillatum* Simon**

Megamyrmaecion penicillatum Simon, 1908: 394 (Drassidae: Drassodinae).

Syntype

1 immature, Torbay (Stat. 162), WAM 11/4278.

Remarks

The current spelling of the generic name is *Megamyrmaekion* Reuss (Platnick 1989).

Lamponidae
***Lampona punctigera* Simon**

Lampona punctigera Simon, 1908: 399 (Drassidae: Drassodinae: Lamponaeae).

Syntype

1 immature, Torbay (Stat. 162), WAM 11/4284.

Heteropodidae
***Isopoda cerussata* Simon**

Isopoda cerussata Simon, 1908: 439 (Clubionidae: Sparassinae: Deleneae).

Syntype

1 immature, Northampton (Stat. 71), WAM 11/4259.

Remarks

Rack (1961) cited a paratype ♂ in ZMH. However, more than one specimen was described by Simon (1908), and all are regarded as syntypes. This species has been transferred to the genus *Isopedella* Hirst by Hirst (1990). The current spelling of the generic name is *Isopeda* (Platnick 1989).

Thomisidae
***Xysticus periscelis* Simon**

Xysticus periscelis Simon, 1908: 431 (Thomisidae: Misumeninae).

Syntype

1 ♀, Perth (Stat. 105), WAM 11/4295.

Salticidae
***Opisthoncus devexus* Simon**

Opisthoncus devexus Simon, 1909: 205 (Salticidae: Triteae).

Syntype

1 immature, Brown Station, Dirk Hartog (Stat. 67), WAM 11/4319.

Remarks

Rack (1961) referred to the ZMH male specimen as the holotype, however, since there are also specimens in MNHP, ZMB and WAM, all are syntypes.

***Servaea spinibarbis* Simon**

Servaea spinibarbis Simon, 1909: 204 (Salticidae: Servaeae).

Syntype

1 immature ♀, Cottesloe (Stat. 113), WAM 11/4315.

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