

Theridiidae: *Episinus*

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Episinus is found worldwide and is relatively species rich in N. C. and S. America but extremely poorly known from the Caribbean. *Episinus* currently counts about 40 extant species in the Americas. The fossil record of *Episinus* is exceptional with nearly 40 described species in Dominican, Chiapas, and Baltic amber. The group was revised by Levi, with species richness likely underestimated. Only 6-8 species are known from the Caribbean, plus a couple of widespread American species. Widespread species such as *E. erythrophthalmus* likely represent species complexes. I expect the group is diverse in the Caribbean, however, no island has been well sampled.



Fig. 1. Distribution of the *Episinus*, extracted from Platnick (2011). Two 'widespread species' occur in the Caribbean, both may represent a complex of related species.

Monophyly. Monophyly is untested. I suspect there are two main groups which I will be approximately monophyletic, (1) the relatively large bodied *E. angulatus* and relatives, and (2) the small bodied forms (majority of 'Episinus'). No molecular tests of these groups have been made.

Amber species. Five *Episinus* species are known from Dominican amber, two from Chiapas amber, and over 30 from Baltic amber. Fossils I have seen appear similar to extant species.

Dispersal. *Episinus* spiders are probably somewhat intermediate dispersers. They are known from some isolated islands and are documented ballooning. Their distribution in the Caribbean is unknown.

Search strategy. Most species are fairly small (2-6 mm body length), some are larger (~10 mm). *Episinus* make **SIMPLE LINE WEBS** (Fig. 2) and often 'hang out' on single lines. They are readily collected by visual search at night, and beating during day. **AERIAL SEARCH AT NIGHT, BEATING**

Similar genera. Can be confused with other theridiinae spiders, especially males on single lines at night. Also, *Spintharus* makes identical webs, but they are relatively rare. Best to collect all theridiids.

Needed collecting. All areas are in need of new collecting, especially for DNA-ready material. The Caribbean islands, in particular, are virtually unknown. Sampling from continents is necessary for biogeographical questions.

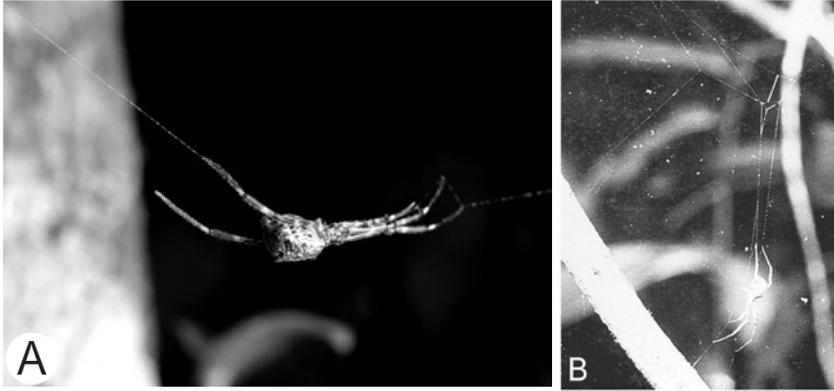


Fig. 2. A, *Episinus* sp. in web. B, *E. cognatus* female (photo W. Eberhard). Typical webs are H shaped with four lines, held in each of legs I and IV as seen in *E. cognatus*. Individuals are often found also on single lines.

References

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