

This is a PDF version of PECKHAMIA 2(2): 31-32, December 1981. Pagination of the original document has been retained. Editor's note (50.1): The accepted name for *Eris marginata* is now *E. militaris*. All *Metaphidippus* listed here are now placed in the genus *Pelegrina*, with the exception of *M. canadensis*, which is now placed in the genus *Ghelna* (Maddison, W. P., 1996, Bull. Mus. Comp. Zool. 154(4): 215-368).

KEY TO LATE INSTAR IMMATURES OF METAPHIDIPPUS AND ERIS (SALTICIDAE) IN MINNESOTA.

Bruce Cutler

While most taxonomists are content to deal with the vicissitudes of distinguishing adult salticids, for certain studies it is necessary to be able to distinguish immature stages also. In connection with a study of cold hardiness of *Metaphidippus*, it was necessary to collect immatures and be able to tell the species apart. By collecting in different habitats it is relatively easy to be certain of getting different species. However, *Eris marginata* (Walck.), which occurs in several of these habitats and in similar size instars, also resembles *M. flavipedes* (Peckham and Peckham) and *M. protervus* (Walck.). I have been able to work out a reasonable field key based on living specimens, and only requiring a 10X hand lens. Not all specimens fit the key well, but these may be discarded; I have rarely encountered a lack of immatures in appropriate habitats. By keeping only those specimens one is certain of, physiological or behavioral studies may be confidently entered into. Keeping in mind the limitations of the key, it works well (for me!). *Metaphidippus galathea* (Walck.) does not occur in

Minnesota as far as I can determine, but I have included it since it is such a common species in some nearby states; specimens examined for this key were from northern Illinois. In the two grassland species, *M. insignia* (Banks) and *M. arizonensis* (Peckham and Peckham), light scales on the venter of the opisthosoma obscure the dark lines there. Some specimens of *M. canadensis* (Banks) have the middle of the three ventral lines faint, or even absent.

- 1a. Opisthosoma with distinct dorsal longitudinal stripes *M. arizonensis* (Peckham & Peckham) 2
- 1b. Not distinctly longitudinally striped dorsally 2
- 2a. Distinct white stripes over anterior eyes; yellow legs with femoral black stripe (not ring)-
this character is variable, but if present is a good confirmation *M. flavipedes* (Peckham & Peckham)
- 2b. No white stripes over anterior eyes..... 3
- 3a. Scales on venter of opisthosoma usually obscure stripes; spots restricted to posterior 2/3
of opisthosoma on dorsum; overall yellow cast *M. insignis* (Banks)
- 3b. Lines on venter of opisthosoma distinct, spots or brown markings on dorsum of opisthosoma
extensive up to anterior border 4
- 4a. Single line on venter of opisthosoma *Eris marginata* (Walck.)
- 4b. Three lines, or a single broad band subdivided into three 5
- 5a. Lines on venter red-brown to red; dorsum of opisthosoma pale background with distinct
spots, faintly connected..... *M. protervus* (Walck.)
- 5b. Lines on venter black-brown to black; dorsum of opisthosoma with spots distinctly
connected, often with a chevron pattern..... 6
- 6a. Legs ringed heavily and distinctly, femur ringed; dorsum of opisthosoma pale background...*M. galathea* (Walck.)
- 6b. Legs less obviously ringed, femur striped; dorsum of opisthosoma dark background.....*M. canadensis* (Banks)