

XVth International Rotifer Symposium: University of Texas at El Paso 3–9 June 2018

Guidelines for submitting abstracts - Deadline 31 January 2018

- Abstracts should report new research in rotifer biology (*sensu lato*), i.e. including acanthocephalans. With the exception of Invited Reviews, papers that review previous work, only, must offer new analyses or interpretations. Abstracts should follow Hydrobiologia's '[Instructions for Authors](#)'. Thus, abstracts should be no longer than 200 words, excluding authors' names, affiliations and keywords. They should not include abbreviations that are not in common use, or unspecified references. Abstracts should start with the overall aim of the study and note pertinent hypotheses, important methods, and major results. Abstracts should conclude by stating implications of the findings that may be of interest to an international, scientific audience. Please see example below (173 words).
- Clearly indicate your preference for an oral or poster presentation. The scientific committee will make the final determination based on the program and time constraints.
- Abstracts must be written clearly and in English. Standard grammar and punctuation rules should be followed. Researchers for whom English is not their first language are encouraged to seek help from a native speaker.
- The abstract must report specific results. While some results may be preliminary, they should not be vague. Abstracts describing work that lack quantitative data (e.g., providing structural interpretations), but they should still address a question and have a "take-home message" derived from the findings.
- Please provide 4 to 6 keywords, in alphabetical order. Keywords should not include any word or term that already appears in the title.
- The names, institutional affiliations, and email addresses of every author must be provided. Any author can be designated as the presenting author. The presenting author's name should be indicated as **bold text**. For the purposes of the symposium, the presenting author is also the corresponding author. Please make sure that the correct person is indicated and that their email address is correct.
- Authors may be a presenting author on one paper, only. All authors are encouraged to obtain and use an [Orcid](#)® identifier. Orcid designations establish a unique, personal digital identifier.
- **Submit your Abstract to rotifer15@gmail.com, cc: wallacer@ripon.edu, by 31 January 2018.**

Example:

ORAL PRESENTATION preferred; poster acceptable

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Title: Empirical evidence for fast temperature-dependent body size evolution in rotifers

Abstract: Organisms tend to decrease in size with increasing temperature by phenotypic plasticity (the temperature-size rule; ectotherms) and/or genetically (Bergmann's rule; all organisms). In this study, the evolutionary response of body size to temperature was examined in the cyclically parthenogenetic rotifer *Brachionus plicatilis*. Our aim was to investigate whether this species, already known to decrease in size with increasing temperature by phenotypic plasticity, presents a similar pattern at the genetic level. We exposed a multiclonal mixture of *B. plicatilis* to experimental evolution at low and high temperature and monitored body size weekly. Within a month, we observed a smaller size at higher temperature, as compared to body size at lower temperature. The pattern was consistent for the size of both mature females and eggs; rotifers kept at high temperature evolved to be on average 14% (after 2 weeks) and 3% (after 3 weeks) smaller than the ones kept at low temperature (10 and 5% in the case of eggs, respectively). We concluded that *B. plicatilis* is genetically programmed to adjust its body size-to-environmental temperature.

Keywords: Bergmann's rule, body size, *Brachionus plicatilis*, experimental evolution, temperature-size rule