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### Of moths, mites and microbes - The role of bacteria in the life history of two arthropod herbivores

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**Publication date**

2016

**Document Version**

Final published version

[Link to publication](#)

**Citation for published version (APA):**

Staudacher, H. (2016). *Of moths, mites and microbes - The role of bacteria in the life history of two arthropod herbivores*. [Thesis, fully internal, Universiteit van Amsterdam].

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# Author contributions

## **Variability of bacterial communities in the moth *Heliothis virescens* indicates transient association with the host**

HEIKE STAUDACHER, *Martin Kaltenpoth, Johannes A.J. Breeuwer, Steph B.J. Menken, David G. Heckel & Astrid T. Groot*

HS, MK & ATG planned the experiments, HS conducted experiments, HS analysed the data, HS, MK, JAJB, DGH, SBJM & ATG wrote the manuscript

## **Sex-specific trade-offs between immune response and reproduction in a moth**

*Andrea Barthel\**, HEIKE STAUDACHER\*, *Antje Schmaltz, David G. Heckel & Astrid T. Groot*

AB, HS, DGH & ATG planned the experiments, AB & AS conducted the experiments, HS analysed the data, AB, HS, DGH & ATG wrote the manuscript

*\*Contributed equally to this study*

## **Effects of immune challenge on the oviposition strategy of a noctuid moth**

HEIKE STAUDACHER, *Steph B.J. Menken & Astrid T. Groot*

HS & ATG planned the experiments, HS conducted the experiments and analysed the data, HS, SBJM & ATG wrote the article

## **The bacterial symbionts *Wolbachia*, *Cardinium* and *Spiroplasma* affect gene expression and survival of their spider mite host and impact distinct induced responses in plants**

HEIKE STAUDACHER\*, *Bernardus C.J. Schimmel\**, *Mart M. Lamers, Nicky Wybouw, Astrid T. Groot & Merijn R. Kant*

HS, BCJS, ATG, & MRK planned the experiments, BCJS, HS & MML conducted the experiments, HS & NW analysed the data, HS, BCJS, ATG & MRK wrote the manuscript

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# Biography

Heike Staudacher was born on the 30th of January, 1982 in Schramberg, Germany. She obtained the Abitur at the Gymnasium Schramberg in 2001. After the Abitur, Heike studied media informatics for one semester and took a 1-year course in digital film directing at the SAE in Amsterdam. In 2004, she started her studies of Biology at the Free University in Berlin, with paleontology, zoology and genetics as minors and ecology as major subject. She conducted her Diploma thesis at the Max Planck Institute for Chemical Ecology in Jena, Germany, and finished her studies in 2009. In 2010, Heike worked as a field technician on population dynamics of *Aedes aegypti* in Mexico for three months. In 2011, she started her PhD project at the Institute of Biodiversity and Ecosystem Dynamics of the University of Amsterdam with Dr. Astrid Groot as her supervisor and Prof. Dr. Steph Menken as her promotor.

## PUBLICATIONS

- Sato, Y., STAUDACHER, H. & Sabelis, M.W. 2016. Why do males choose heterospecific females in the red spider mite? *Experimental and Applied Acarology* **68**: 21-31.
- Barthel, A.\*, Staudacher, H.\*, Schmaltz, A., Heckel, D. G., & Groot, A.T. 2015. Sex-specific consequences of an induced immune response on reproduction in a moth. *BMC Evolutionary Biology* **15**: 282. (\*equal contribution)
- Melo, J.W.S., Lima, D.B., STAUDACHER, H., Silva, F.R., Gondim Jr, M.G.C. & Sabelis, M.W. 2015. Evidence of *Amblyseius largoensis* and *Euseius alatus* as biological control agent of *Aceria guerreronis*. *Experimental and Applied Acarology* **67**: 411-421.
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# Acknowledgements

First of all, I would like to thank my co-promotor Astrid Groot. Astrid, thanks for all the support that you gave to me in the last years. Thanks for all your ideas, your great enthusiasm for my project and for the freedom to investigate my own ideas. You taught me how important it is to plan well but also to let go, finish and submit things. Your amazing correction speed was particularly helpful with finishing the thesis. I learned from you that openness and courage are very important to move forward. Thanks for everything!

I was lucky to get much additional input from my advisors/ supervisors at the University of Amsterdam and the Max Planck institute for Chemical Ecology in Jena. Steph, I was very happy to have you as my promotor. Thank you for always having an open door for me, for your suggestions about how to proceed and especially for your input on my writing. Martin, I was lucky that you were involved in my thesis from the beginning on. Thank you for giving me a lot of input on my results and plans, especially for your help in investigating bacterial communities, where you supported me in planning, analysing and writing. Thank you also for letting me use your lab facilities in Jena and for the great congress travel to California with your group. Hans, thanks a lot for your input on my work. Your comments often helped me to see where I stand. You always took the time to discuss research plans and results with me and helped me in particular to improve one chapter as a co-author. David, thank you for letting me work in your lab in Jena, for supporting the sequencing of bacterial communities of *Heliothis virescens* and your input on the manuscript that it lead to. Thank you for your ideas and support of the trade-off manuscript of Andrea and me. Merijn, thank you for letting me sneak into your research about spider mite-plant interactions and supporting me and Bart with your suggestions, your investment into our ideas and your help with writing up the chapter. Thanks to the members of my doctorate committee for reading and evaluating my thesis.

Andrea and Bart, we did a lot of work together and I learned a lot from you. Andrea, thank you for your collaboration and for many tips during my PhD. It was great to plan and write our study together and share time with you at the course in Holland and the congress trip to California. Bart, thanks a lot, I am happy that I could do one chapter of my PhD project together with you. We made a good team and I am sure that we will get something great out of our 'side' project.

Thanks to the members of Astrid's group, Michiel, thanks for taking the time to think about ideas and especially discuss statistics with me. Your input helped me a lot to get the statistical part of my thesis done. Dennis, thank you for taking such good care of the moths. Pascaline, thank you, you brightened up my lab and culinary life and helped me a lot with phylogenetic analyses. Rik, thanks for all your tips and help in building things and for many nice dinners together with Sijing. Mart, thanks

for your ideas and motivation, you have helped me a lot with your work for us. Seyed, Masoumeh and Gao Ke, thanks for being such nice colleagues.

Many thanks to the lab technicians, Peter, Betsy and Lin for your good mood, your ideas and support in the molecular lab. Also, many thanks to the infamous greenhouse team, Ludek, Harold and Thijs, for planting and taking care of literally thousands of plants for me. Thank you Jan, for taking great fotos and for being such a fun bass player.

Karen and Rocio thank you for your friendship, your openness, positive energy and the many invaluable hours that we spent together in and outside of UvA in the past years. Debora and Wagner, it was a pleasure to collaborate, eat, chat and play in the snow with you. I am happy that I found such good friends. Joris, thanks for your friendship and many talks and excursions together. Yukie thank you for being such a kind person and for letting me participate in your work. Thanks to my many colleagues at UvA for your company at dinners, coffee breaks, BBQs and other excursions: Juanma, Carlos, Dan, Jie, Paulien, Nina, Sabina, Nicky, George, Maria, Bram, Nazer, Rizwan, Paul, Saioa, Marcus, Maus, Iza, Martijn, Arne, Thomas, Peter R, Firdevs, Josi, Marian, Ciska, Livia, Rachid, Kathrin, Alexandra, Orsi, Claire, Felipe, Ernesto, Estefania, Laura, Cleide, Louise, Anieke, Floor, Hanna. Meine Paranimf Alice, danke, dass du über Alles lachen kannst.

Meine liebe Familie, Mama, Papa, Christian, Fernando und Siglinde, ihr seid immer für mich da, egal was ich mache. Danke für eure unermüdliche Unterstützung. Es ist geschafft!