### Curriculum Vitae – Thomas Blankers

Cornell University Mudd Hall, 215 Tower rd 14850, Ithaca, NY, USA

thomasblankers@gmail.com; tb492@cornell.edu

Date of birth 08 October 1986

Place of Birth Amsterdam, The Netherlands.

Postdoctoral associate in the Shaw lab at Cornell University, Department of Current position

Neurobiology and Behavior. Supervision: Prof. Kerry L. Shaw.

**Degrees** 

**PhD** Humboldt University Berlin, Germany. Supervision: Prof. Matthias Hennig. Graduated

summa cum laude 20 May, 2016.

University of Amsterdam, The Netherlands. MSc in Biological sciences, track Ecology MSc

and Evolution, Graduated cum laude 30 November, 2011.

University of Amsterdam, The Netherlands. BSc in Biology. Graduated 27 August, **BSc** 

2008.

Work and Education	
Aug 2016 – present	Postdoctoral associate, Department of Neurobiology and Behavior, Cornell
-	University, Itaca, NY, USA. Supervision: Prof. Kerry L. Shaw.
Nov 2015 - Jul 2016	Homework tutor. The 4de Gymnasium Amsterdam (high school), The Netherlands.
Aug 2012 - Dec 2016	Guest researcher. Museum für Naturkunde Berlin, Leibniz institute for evolution and
	biodiversity science, Berlin, Germany. GENART (functional genomics of speciation)
	project. Supervision: Dr. Frieder Mayer.
Aug 2012 - Oct 2015	<b>PhD research</b> . Humboldt University Berlin, Germany. Thesis title: <i>Acoustic</i>
	communication, sexual selection, and speciation in field crickets. Supervision: Prof.
	Matthias Hennig.
Jun 2012 - Jul 2012	Sailing and windsurfing instructor at the Sloterplas lake in Amsterdam, The
	Netherlands.
Apr 2012 – May 2012	<b>Teacher Assistant</b> in the undergraduate course 'Evolutionary Genetics' at the
	University of Amsterdam. Supervision: Prof. Hans Breeuwer
Dec 2011- Feb 2012	<b>Teacher Assistant</b> . Testing and evaluating the suitability of a student-generated
	evolutionary genetics experiment for undergraduate education. Subject: UV-induced
	mutagenesis of the lac-operon in Escherichia coli. UvA. Supervision: Prof. Hans
	Breeuwer.
Sep 2009 - Nov 2011	Master in biological sciences, track Ecology and Evolution, University of
_	Amsterdam. Graduated cum laude 30 November, 2011
Jan 2011- Nov 2011	MSc Research project (60 ECTS) at the Stony Brook University (SBU), Stony
	Brook NV USA in the department of ecology and evolution. Thesis title: Adaptive

Brook, NY, USA, in the department of ecology and evolution. Thesis title: Adaptive

Radiation and Morphological diversification in Salamanders and Lizards. Supervision: Prof. John J. Wiens (SBU), Prof. Steph B.J. Menken (UvA).

Teacher Assistant in the undergraduate course 'Genetics and Evolution' at the Nov 2010 - Dec 2010

University of Amsterdam. Supervision: Prof. Hans Breeuwer

Sailing and windsurfing instructor at the Sloterplas lake in Amsterdam, The Jul 2010 - Sep 2010

Netherlands.

MSc Research project (30 ECTS) at the VU University Amsterdam within the Mar 2010 - Jun 2010

department of Animal Ecology. Thesis title: Nutrient signaling: genomics underlying lipid metabolism pathways in the parasitoid wasp Nasonia vitripennis. Supervision:

Merijn Kant (UvA), Jacintha Ellers (VU), Bertanne Visser (VU).

Break + Spanish course in Spain. Sep 2008 - Aug 2009

## Curriculum Vitae – Thomas Blankers

Sep 2005 – Aug 2008 **Bachelor in biology.** University of Amsterdam, The Netherlands. Graduated 27 August, 2008

Apr 2008 - May 2008 BSc Research project (18 ECTS) at the University of Amsterdam within the

Institute for Biodiversity and Ecosystem Dynamics (IBED). Thesis title: Adaptive speciation appraised: how disruptive selection forces sympatric populations of the

two-spotted spider mite to diversify. Supervision: Martijn Egas.

Sep 2007 Course for high school education in life sciences at the University of Amsterdam (12 ECTS). Supervision: Riny van Krieken (UvA – Interfacultaire Lerarenopleidingen).

# Publications (\* marks undergraduate student contributions, number of citations in parentheses) Accepted/published

- 1. **Blankers, T.**, Vilaca, S.T., Waurick, I., Gray, D.A., Hennig, R.M., Mazzoni, C.J. & Mayer, F, Berdan, E.L. 2018. Demography and selection shape transcriptomic divergence in field crickets. Evolution. Accepted manuscript: https://www.biorxiv.org/content/early/2017/09/25/193839
- 2. **Blankers, T.**, Block, R\*. & Hennig, R.M. 2017. Codivergence but limited covariance of wing shape and calling song structure in field crickets (*Gryllus*). *Evol. Biol.* https://doi.org/10.1007/s11692-017-9439-2
- 3. **Blankers, T.**, Gray, D.A. & Hennig, R.M. 2017. Multivariate phenotypic evolution: divergent acoustic signals and sexual selection in *Gryllus* field crickets. *Evol. Biol.* **44**: 43-57
- 4. Gray, D.A., **Blankers, T.** & Hennig, R.M. 2016. Multivariate female preference tests reveal latent perceptual biases. *Proc. Roy. Soc. B: Biol. Sci.* **283**: 1842
- 5. **Blankers T**. 2016. Acoustic communication, sexual selection, and speciation in field crickets. *Phd Thesis*. https://edoc.hu-berlin.de/handle/18452/18205
- 6. Berdan, E.L., **Blankers, T**., Waurick, I., Mazzoni, C.J., & Mayer, F. 2016. A genes eye view of ontogeny: *De novo* assembly and profiling of the *Gryllus rubens* transcriptome. *Mol. Ecol. Res.* **16**:1478-1490
- 7. Hennig, R.M., **Blankers**, T. & Gray, D.A. 2016. Divergence in male cricket song and female preference functions in three allopatric sister species. *J. Comp. Phys. A.* **202**:347-60
- 8. **Blankers, T.**, Lübke, A.K.\* & Hennig, R.M. 2015. Phenotypic variation and covariation indicate high evolvability of acoustic communication in crickets. *J. Evol. Biol.* **28**: 1656-1669
- 9. **Blankers, T.**, Hennig, R.M. & Gray, D.A. 2015. Conservation of multivariate female preference functions and preference mechanisms in three species of trilling field crickets. *J. Evol. Biol.* **28**: 630–641.
- 10. **Blankers, T**., Townsend, T.M., Pepe, K., Reeder, T.W. & Wiens, J.J. 2013. Contrasting global-scale evolutionary radiations: Phylogeny, diversification, and morphological evolution in the major clades of iguanian lizards. *Biol. J. Linn. Soc.* **108**: 127–143.
- 11. **Blankers, T.**, Adams, D.C. & Wiens, J.J. 2012. Ecological radiation with limited morphological diversification in salamanders. *J. Evol. Biol.* **25**: 634–646.

#### In review/revision

- 1. **Blankers**, **T**., Oh, K.P., Bombarely, A., Shaw, K.L. The genomic architecture of a rapid island radiation: mapping chromosomal rearrangements and recombination rate variation in *Laupala*. http://www.biorxiv.org/content/early/2017/07/08/160952
- 2 Blankers, T. Oh, K.P., Shaw, K.L. The genetic basis of inter-island mating behavior divergence

## Conference Posters & Talks (\* talks, † invited talks)

- \*Blankers, T. Shaw K.L. Convergence and constraints in behavioral isolation: a tale of two crickets. NBB symposium 2017, Ithaca, NY, USA, 8 December 2017
- \*Blankers, T. Shaw, K.L. The genomic architecture of repeated sexual signal divergence. Evolution, Portland (OR), 26 June 2017.
- **Blankers**, **T**. Shaw, K.L. The geographic context of speciation in crickets. Evolution, Portland (OR), 26 June 2017.
- †Blankers, T. Shaw, K.L. Sexual selection, population divergence, and the genomic mosaic of local evolutionary histories. EvoDay, Lab of Ornithology, Cornell University. Ithaca NY, USA 11 May 2017.
- \*Blankers, T. Shaw, K.L. Speciation islands? Behavioral and genomic divergence along a spatio-temporal cline. Cornell University NBB symposium 2016. Ithaca NY, USA, 9 December 2016.
- †Blankers, T. Acoustic communication, sexual selection, and speciation in field crickets. University of Amsterdam, 11 May 2016.

- **†Blankers T**. & Berdan E.L. Population genetics becomes population genomics: what the 'omics era means for evolutionary biology. Berlin Center for Genomics and Biodiversity Research (BeGenDiv), Berlin, Germany, 23 September 2015.
- \*Blankers T., Berdan E.L., Vilaca S., Waurick I., Mazzoni C.J., Gray, D.A. & Mayer F. Divergence in acoustic and chemical mate signaling genes after speciation with gene flow in field crickets. Berlin Center for Genomics and Biodiversity Research (BeGenDiv), Berlin, Germany, 23 September 2015.
- **Blankers T.**, Berdan E.L., Vilaca S., Waurick I., Mazzoni C.J. & Mayer F. Patterns of transcriptomic divergence and demographic history in field crickets. Candidate genes for the evolution of reproductive isolation in the presence of gene flow. European Society for Evolutionary Biology, Lausanne, Switzerland, 2015.
- \*Blankers T., The genetic architecture of calling song and song preference traits in *Gryllus rubens* and *G. texensis*. Patterns of inheritance and phenotypic integration. Ortoptheran Bioacoustics Meeting, Zingst, Germany, 2015.
- **Blankers T.**, Mayer F. & Hennig R.M. Premating reproductive isolation between two closely related cricket species. European Society for Evolutionary Biology, Lisbon, Portugal, 2013.

#### Peer reviews

Axios Review (1), Biological Journal of the Linnean Society (2), Contributions to Zoology (1), Evolution (1), Zoological Journal of the Linnean Society (1).

## **Supervising and Mentoring**

I have supervised 3 BSc students two of which have provided a substantial contribution to a published/submitted manuscript. I have also assist in three BSc courses and one MSc course at the Humboldt University, 2 BSc courses at the University of Amsterdam, and have substantial experience in tutoring and lecturing at high schools. I currently co-advise one graduate student at Cornell University.

#### **Funds Raised**

2011 Amsterdams Universitair Fonds

2011 Stichting Dr. Hendrik Muller Vaderlandsch Fonds

# Languages

Dutch: native

English: academic/proficiency German: academic/proficiency

Spanish: advanced

## References

Prof. R. Matthias Hennig, Humboldt-University Berlin, Germany. <a href="mailto:matthias.hennig@biologie.hu-berlin.de">matthias.hennig@biologie.hu-berlin.de</a>
Prof. Kerry L. Shaw, Cornell University, NY, USA. <a href="mailto:kls4@cornell.edu">kls4@cornell.edu</a>