Curriculum Vitae | Yimen Araya-Ajoy

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Education

2011-2015	**PhD (graduated with honours)**
	Max Planck Institute for Ornithology, Germany
2008	**Master (graduated with honours)**
	Department of Biology, University of Costa Rica, Costa Rica

Academic positions

2021-	**Researcher**
	Department of Biology, NTNU, Norway
2017-2020	**Postdoctoral researcher**
	Centre for Biodiversity Dynamics, Department of Biology, NTNU, Norway
2015-2016	**Postdoctoral researcher**
	Max Planck Institute for Ornithology, Germany
2008-2010	**Academic Assistant**
	Council on International Educational Exchange, USA - Costa Rica

Fellowships & Awards

2021-2025	**Young Research Talent Grant**: Socio-Eco-Evo dynamics
	The Research Council of Norway (NFR), Role: Principal investigator, $800,000
2021-2025	**Outstanding Academic Fellow Program**
	Organization: Norwegian University of Science and Technology, $60,000
2020-2023	**International Partnerships for Excellent Education & Research**
	Developing tools for research and teaching statistics. NFR. Role: partner
2020-2023	**Universidad de Costa Rica Funds for Research Groups**
	Vocal communication in Spix's disc-winged bat. Role: partner, $50,000
2019-2021	**Austrian Science Foundation Stand-alone project**
	The interplay between animal personality and sexual selection. Role: partner
2018	**Pitelka Award for Excellence in Research**
	Organization: International Society for Behavioural Ecology $1000
2011-2015	**Doctoral fellowships**
	Deutscher Akademisher Austauschdienst Dienst $43,000
	International Max Planck Research School $14,000
2007	**Master's Research Fellowships**
	Ulm University exchange fellowship
	Organization for Tropical Studies research fellowship

Professional service

2023–	**Associate Editor**, Evolution
2022–	**Editorial Board**, Behavioural Ecology

Research track record

My publications demonstrate a strong record of high-quality research in the fields of evolutionary and behavioral ecology, and my citation and publication rates are increasing (🎓). I have published **>50 papers** in peer reviewed journals. My work has attracted **>3300 citations**, has an **h-index of 25** and **i10-index of 43**.

I preferentially publish in journals run by scientific societies, and hence some of the profits return to the scientific community. Accordingly, my papers include: 6 in Evolution and Behavioural Ecology, 5 in Methods in Ecology and Evolution and Proc. B, 3 in Journal of Animal Ecology, 2 in Ecology Letters, and 1 in PNAS, Animal Behavior, American Naturalist, Functional Ecology and Evolution Letters.

Here, I highlight 15 **selected publications** describing my theoretical, methodological and empirical contributions.

Empirical

1) **Araya-Ajoy, Y. G.**, Frank, T. H., Burnett, H., Søraker, J. S., Ranke, P. S., Goedert, D., Ringsby, T.-H., Jensen, H., Sæther, B.-E. Assessing the "Small Population" Paradigm: The Effects of Stochasticity on Evolutionary Change and Population Growth in a Bird Metapopulation. Ecology Letters, 2025.

2) **Araya-Ajoy Y. G.**, Niskanen A, Ranke P, et al. Variation in generation time reveals density regulation as an important driver of pace of life in a bird metapopulation. Ecology Letters, 2021

3) **Araya-Ajoy, Y. G.** & Dingemanse, N.J. Repeatability, heritability, and age-dependence of seasonal plasticity in aggressiveness in a wild passerine bird. Journal of Animal Ecology, 2017

4) **Araya-Ajoy, Y. G.**, Dingemanse Niels J., Kempenaers B. Timing of extrapair fertilizations: within-pair fertilization trade-offs or pair synchrony spillovers? Behavioral Ecology, 2016*

   * Pitelka award for excellence in research, ISBE

5) **Araya-Ajoy, Y. G.**, Kuhn, S., Mathot, K. J., et al. Sources of (co)variation in alternative siring routes available to male great tits (Parus major). Evolution, 2016

Theoretical and conceptual

6) **Araya-Ajoy Y. G.**, Dingemanse, N. J., Westneat D., Wright, J. The evolutionary ecology of variation in labile traits: selection on its among- and within-individual components, Evolution 2023.

7) Murray M.*, Wright, J., **Araya-Ajoy Y.G.** Evolutionary rescue from climate change: male indirect genetic effects on lay-dates and their consequences for population persistence, Evolution Letters, 2023. *Current PhD student.

8) **Araya-Ajoy, Y. G.**, Westneat, D., Wright, J. Pathways to social evolution and their eco-evolutionary feedbacks, Evolution, 2020.

9) Dingemanse, N. J., **Araya-Ajoy Y. G.** Interacting personalities: behavioural ecology meets quantitative genetics, TREE, 2015.

10) **Araya-Ajoy, Y. G.** & Dingemanse, N. J. Characterizing behavioural "characters": an evolutionary framework, Proceedings of the Royal Society B, 2014.

Methodological

11) Pick, J.*, Kasper, L., Allegue H., … **Araya-Ajoy, Y. G*.** Describing posterior distributions of variance components: Problems and the use of null distributions to aid interpretation, Methods in Ecology and Evolution, 2023

* Authors contributed equally to this study

12) Munar-Delgado, G.*, **Araya-Ajoy, Y. G.***, & Edelaar, P. Estimation of additive genetic variance when there are gene–environment correlations: Pitfalls, solutions and unexplored questions, Methods in Ecology and Evolution, 2023

* Shared first author, reflecting my major contribution to work led by a PhD student

13) Dingemanse N. J., **Araya-Ajoy Y. G.**, Westneat D. F. Most published selection gradients are underestimated: why this is and how to fix it, Evolution, 2021

14) **Araya-Ajoy, Y. G.**, Ranke, P. S., Kvalnes, et al. Characterizing morphological (co)variation using structural equation models: body size, allometric relationships and evolvability in a house sparrow metapopulation, Evolution, 2019

15) **Araya-Ajoy, Y. G.**, Mathot, K. J., Dingemanse, N.J. (2015) An approach to estimate short-term, long-term and reaction norm repeatability, Methods in Ecology and Evolution, 2015

Contributed software to official repositories

I have contributed to two R packages associated with papers I have published. Although not in official repositories, code for all my papers published since 2014 is available as supplementary material or on MyGitHub.

1) SQuID: (2018) R package available in the Comprehensive R Archive Network (CRAN).

Allegue, H., **Araya-Ajoy, Y. G.**, Dingemanse, N. J., Dochtermann, N. A., Garamszegi, Z., Nakagawa, S., Schielzeth, H. & Westneat, D. F. Statistical Quantification of Individual Differences (SQuID): an educational and statistical tool for understanding multilevel phenotypic data in linear mixed models. Methods in Ecology and Evolution, 2016

2) MultiRR: (2015) R package available in the Comprehensive R Archive Network (CRAN).

Araya-Ajoy, Y. G., Mathot, K. J., Dingemanse, N.J. An approach to estimate short-term, long-term and reaction norm repeatability, Methods in Ecology and Evolution, 2015

Educational leadership

I aim to foster a creative and inclusive research and teaching environment by being open-minded and approachable in order to create a space where diverse perspectives are valued and innovative ideas flourish. I try to be understanding of the challenges of research and learning in the hopes of offering guidance through clear communication and mentorship. I am strongly committed to inclusivity and diversity, and I prioritize the well-being of students.

Mentoring

I am currently the main supervisor of two PhD students. Myranda Murray started working in 2021 on the project "Social Evolution and its Consequences for Population Persistence in a Changing World. She has already published the paper:

Murray M.*, Wright, J., **Araya-Ajoy Y.G.** Evolutionary rescue from climate change: male indirect genetic effects on lay-dates and their consequences for population persistence, Evolution letters, 2023

Tor Hansson Frank started in 2022 working on the project "Density-dependent Competition and its Consequences on the Eco-Evolutionary Dynamics of Small Fragmented Populations".

I am also co-supervising Jørgen Søraker, who just started his PhD at the University of Oxford in the Department of Zoology. Previously, he was my Master's student and his thesis is in review in the Journal of Evolutionary Biology.

Student supervision in numbers

Master	PhD	University or institution
8	2	Centre for Biodiversity Dynamics, Department of Biology, NTNU, Norway.
4	2	Max Planck Institute for Ornithology and Ludwig Maximilians-University of Munich, Germany.

Teaching

Here I highlight workshops which I have taught that demonstrate my expertise in theory and quantitative methods used in evolutionary ecology.

1) **Mixed Effect Models in Ecology and Evolution**. UC Davis, USA 2023; CEFE, Montpellier, France, 2018* & 2022; NTNU, Trondheim, Norway, 2017* & 2022*; U. Melbourne, Australia, 2015*; Max Planck, Germany, 2014*.

   *Main teacher of the workshop

2) **The Hierarchical Nature of Life History Evolution in Natural Populations**. "Advanced school in Life history theory". University of Costa Rica, San José, Costa Rica, 2016 & 2017*. University of Groningen, the Netherlands, 2018*.

*Main teacher, invited teacher of an advanced school

3) **Statistical Approaches to Multivariate Phenotypes***, Max Planck Institute and Centre for Biodiversity Dynamics, Germany-Norway.

*Main teacher

4) **Behavioural Ecology meets Quantitative Genetics***, Ludwig-Maximilians University of Munich, LMU, Germany, 2013-2014.

* Main teacher for a university course

5) **Tropical Ecology***, Council for International Exchange Education, USA-Costa Rica 2008-2010.

*Teaching assistant for semester abroad program