

CURRICULUM VITAE

Tony Wilson, Ph.D.
Department of Biology
Brooklyn College (CUNY)
2900 Bedford Avenue
Brooklyn, NY, 11210
United States

Phone: 1-718-951-5000 x6953 Fax: 1-718-951-4659

twilson@brooklyn.cuny.edu
<http://evolution.brooklyn.cuny.edu>



DATE OF BIRTH: November 23, 1974
NATIONALITY: Canadian
LANGUAGES: English, French, German

POSITIONS HELD TO DATE:

UNIVERSITY OF MARYLAND MEDICAL SCHOOL, Baltimore, MD
Department of Microbiology and Immunology
• Visiting Assistant Professor (2020-2021)

BROOKLYN COLLEGE, New York City, USA
Department of Biology
• Professor for Evolutionary Biology (2024-)
• Associate Professor for Evolutionary Biology (2013-2024)

UNIVERSITY OF ZÜRICH, Zürich, Switzerland
Institute of Evolutionary Biology and Environmental Studies, Zoological Museum
• Assistant Professor for Evolution and Biodiversity (2005-2013)

NORTHWEST FISHERIES SCIENCE CENTER, Seattle, USA
• National Research Council Research Associate (2002-2004)

EDUCATION / RESEARCH:

UNIVERSITY OF KONSTANZ, Konstanz, Germany
MUSEUM FÜR NATURKUNDE, Berlin, Germany
• Ph.D. (Biology) – 1998-2002
• Thesis: *Molecular investigations of speciation in the sea – Comparing patterns of diversification in freshwater and marine organisms*
(Advisor: Professor Axel Meyer)

UNIVERSITY OF GUELPH, Guelph, Ontario, Canada
• M.Sc. (Zoology) – 1996-1998
• Thesis: *Dispersal patterns of Dreissena bugensis in the Laurentian Great Lakes as inferred from highly polymorphic microsatellite markers* (Advisor: Dr. Elizabeth Boulding)

ACADIA UNIVERSITY, Wolfville, Nova Scotia, Canada
• B.Sc. (Hons.) – 1992-1996 : Major: Biology; Minors: Physics, Math
• Research Project: *Genetic investigations of Corophium volutator (Pallas, 1766) Leach in the North Atlantic*
(Advisor: Dr. Marlene Snyder)

ACADEMIC AWARDS/HONOURS (2000-):

- 2010 – University of Bayreuth: Faculty Search “*Tierökologie I*” – 3rd Position
- 2002-04 – Natural Sciences and Engineering Research Council of Canada – Postdoctoral Fellowship (Declined)
- 2001 – Deutscher Akademischer Austausch Dienst (DAAD) - International Student Award

GRANTS / FELLOWSHIPS:

- 2024 – **US National Science Foundation**: "MCA: Genomic Diversity, Adaptive Immunity and Immune Memory" (US\$372 060)
- 2021 – **US National Science Foundation**: "REPS Supplement: Brooklyn Urban Ecology and Environment Program" (US\$21 800)
- 2021 – **PSC-CUNY Research Grant**: "Genomic Diversity, Adaptive Immunity and Immune Memory" (US\$11 951)
- 2021 – **US National Science Foundation**: "REU: Brooklyn Urban Ecology and Environment Program" (US\$398 763)
- 2017 – **PSC-CUNY Research Grant**: "Functional Immunity as a Driver of Adaptive Divergence: From Pattern to Process" (US\$11 949)
- 2017 – **US National Science Foundation**: "REU: Brooklyn Urban Ecology and Environment Program" (US\$349 997)
- 2017 – **US National Science Foundation**: "DDIG: Isolating a Mechanism for Microbial-Host Local Adaptation" (US\$20 294)
- 2015 – **Waitt Foundation**: "Genetic Evaluation of a Dramatic Population Collapse Associated with Coastal Warming" (US\$9 840)
- 2015 – **PSC-CUNY Research Grant**: "Endocrinological Control and the Evolution of Male Pregnancy" (US\$6 000)
- 2015 – **Student Technology Grant**: "The Use of Genomic Tools in Undergraduate Education" (US\$10 000)
- 2011 – **Swiss National Science Foundation**: "The Evolution of Reproductive Complexity in Syngnathid Fishes" (250 000 CHF)
- 2008 – **European Science Foundation THERMADAPT**: "Climate-Mediated Reproductive Variation in Pipefish" (€1 045)
- 2006 – **Swiss National Science Foundation**: "Bergmann's Rule in Ectotherms: Sexual vs. Fecundity Selection" (260 000 CHF)
- 2006 – **Stiftung für wissenschaftliche Forschung an der Universität Zürich**: "Gen-Expression während der männlichen Schwangerschaft in Pfeifenfischen (Syngnathidae: Seenadeln und Seepferdchen)" (20 000 CHF)
- 2005 – **European Science Foundation CONGEN**: "Global Climate Change and Reproductive Biology of Nearshore Fishes" (€910)
- 2002 – **US National Research Council**: "Molecular Approaches to the Study of Sexual Selection in Syngnathid Fishes" (US\$84 500)
- 1999 – **COA Grant**: "Evolution of Lake Tanganyika Gastropoda: A Predator/Prey Model of Coevolution?" (US\$1 000)
- 1999 – **Canadian Natural Sciences and Engineering Research Council**: "Evolution of Lake Tanganyika Gastropoda: A Predator/Prey Model of Coevolution?" (C\$38 200)

SUPERVISORY EXPERIENCE:

- **Postdoctoral Fellows (5):**
 - Dr. Sunny Scobell (2013-2016) – “Reproductive Endocrinology and the Evolution of Male Parental Care”
 - Dr. Florentine Riquet (2013-2015) – “The Impact of Habitat Restoration on Nearshore Connectivity”
 - Dr. Alexander Nater (2012-2013) – “Genetic Evaluation of a Dramatic Population Collapse Associated with Coastal Warming”
 - Dr. Camilla Whittington (2011-2013) – “The Evolution of Reproductive Complexity in Syngnathid Fishes”
 - Dr. Marie Gauthier (2009-2011) – “The Functional Genomics of Reproductive Complexity”
- **PhD Candidates (5):**
 - Jimiane Ashe, M.Sc. (2013-2021) – “Genetic Responses to Acute and Chronic Immune Challenge in MHC-Deficient Individuals”
 - Frieda Benun-Sutton (2014-2019) – “The Evolution of Reproductive Complexity in Fishes”
 - Dipl. Biol. Angela Bahr (2007-2011) – “Major Histocompatibility Gene Evolution and Male Mate Choice in Seahorses”
 - Dipl. Biol. Kai Stölting (2006-2010) - “Functional Genomics of Male Pregnancy in Syngnathid Fishes (Family Syngnathidae)”
 - Dipl. Biol. Jasmin Winkler (2007-2010) - “Environmental Influences on Growth and Reproduction of European Pipefish”
- **M.Sc. Candidates (8):**
 - Florian Moser (2012-2013) – “Ecological Speciation via Hybridization”
 - Anja Bürkli (2010-2011) – “Taphonomic Continuity in Live and Death Assemblages of Marine Molluscs” – **Semester Prize**
 - Pascal Hablützel (2008-2009) – “Interspecific Hybridization in European Pipefishes”
 - Alexandra Wegmann (2008-2009) – “Geographic Variation in Trophic Morphology of a Syngnathid Pipefish”
 - Lisa Palme (2007-2008) – “Genome Evolution and Sex-Determination in Syngnathid Fishes”
 - Beat Mattle (2006-2007) – “The Role of Body Size in Mate Choice of *Hippocampus abdominalis*”
 - Iris Eigenmann (2006-2007) - “Phylogeography of European Pipefish (Syngnathus: Syngnathidae)”
 - Valeria Rispoli (2006-2007) - “Reproductive Variation in Populations of European Pipefish (*Syngnathus typhle*)”

SUPERVISORY EXPERIENCE (CONT.):

- **Undergraduate Students (49):**

- Ariana Berrios (2024) – “Relative Parental Investment and Multiple Mating in Nearshore Pipefish”
- Sophia Neiblum (2024) – “Relative Parental Investment and Multiple Mating in Nearshore Pipefish”
- Jazmyn Gutierrez (2024) – “Relative Parental Investment and Multiple Mating in Nearshore Pipefish”
- Katrine Kazakova (2024) – “Seahorse Reproduction and Aquarium Health”
- Eliza Gonzalez (2023-24) – “Sex Determination in the Seahorse”
- Dilfuza Kurbanova (2023-) – “In Vitro Synthesis of *Hippocampus* Immunoglobulin”
- Najib Nasution (2023-24) – “Microbial Culture for Experimental Pipefish”
- Mellisa Ramnath (2023-) – “Female Multiple Mating in *Syngnathus fuscus*”
- Anna Lagunova (2023) – “Mate Choice Preferences in *Syngnathus* pipefish”
- Evelyn Papalimberis (2023) – “Relative Parental Investment and Multiple Mating in Nearshore Pipefish”
- Xylo Lazrinth (2023) – “Relative Parental Investment and Multiple Mating in Nearshore Pipefish”
- Marisa Dellituri (2023-2024) – “Adaptive Immunity in the Seahorse”
- Meriem Guettatfi (2023) – “The Evolution of Adaptive Immunity in Pipefish”
- Michael Magno (2023-) – “Seahorse Aquaculture” (**Undergraduate Award**)
- Odaine White (2023) – “Analysis of Feeding Behavior in Nearshore Pipefish (*Syngnathus fuscus*)” (**Undergraduate Award**)
- Laura Kuksa (2023) – “Quantifying Relative Parental Investment in the Pipefish”
- Mitchell Borchsch (2023) – “The Role of Prolactin in Male Parental Care”
- Angeles Fermin (2022-23) – “Mate Choice Preferences in *Syngnathus* pipefish”
- Sam Ocean (2022-) – “Microbiological Diversity and Local Adaptation” (**Undergraduate Award**)
- Paola Salazar (2022) – “Potential Reproductive Rates in Nearshore Pipefish”
- Aradhna Johnson (2022) – “Potential Reproductive Rates in Nearshore Pipefish”
- Raizy Kipperman (2022) - “Adaptive Immunity in the Seahorse”
- Tasluba Bushra (2022) – “Transcriptome Assembly using a Reference Genome”
- Daniel McKenna (2021-22) – “Aquarium Design and Cycling”
- Dvorah Nelson (2021-23) – “Adaptive Immunity in the Seahorse”
- Cassiel Padilla-Duran (2021) – “Partitioning Relative Parental Investment in Nearshore Pipefish”
- Anna Silverstein (2021) – “Partitioning Relative Parental Investment in Nearshore Pipefish”
- Kyra Novick (2019) – “Quantifying Male Investment in Reproduction”
- Ken Mey (2019) – “Male Parental Investment and Pregnancy in Syngnathid Fishes”
- Sidonie Horn (2019) – “Male Parental Investment and Pregnancy in Syngnathid Fishes”
- Nira Rahman (2018) – “Urban Activity as a Driver of Adaptive Divergence”
- Corey Lavine (2018) – “The Dynamics of Reproductive Behavior in Nearshore Pipefish”
- Alec Reed (2018) – “Prolactin Receptor in the Male Brood Pouch”
- Sandra Roosna (2017-18) – “The Prolactin Axis in Syngnathid Reproductive Behavior”
- Joshua Khalfin (2016-18) – “Functional Immunity in Freshwater Stickleback”
- Krystal Boley (2016-17) – “Ecomorphology and Functional Diversity in California Pipefish”
- Jabir Bhuiyan (2015) – “Immune Diversity, Selection, and Genome Evolution”
- Megan Low (2015) – “Investigation of a Novel Endocrine Axis in a Male-Pregnant Fish”
- Theila Smith (2015) – “Male Reproductive Cycling During Pregnancy in *Syngnathus fuscus*”
- Lital Fleyschmakher (2014) – “Polyandry and Environmental Variation in *Syngnathus abaster*”
- Valerie Sykora (2012) – “Genome Evolution and Immunity”
- Janine Mazenauer (2011) – “Environmental Variability and Aquatic Health”
- David Tanno (2010) – “Growth in Juvenile European Pipefish *Syngnathus typhle*: A Common Garden Experiment”
- Anja Bürkli (2009) – “Diversity of the Marine Molluscs of the Southern Coast of Sardinia”
- Eric Garcia (2008) – “Hybridization as a Source of Genetic Diversity in Californian Pipefishes”
- Nathalie Feiner (2007) – “Gene and Genome Duplications in Syngnathid Fishes”
- Katrin Bacher (2006) – “A Novel Approach to Maternity Analysis in Pipefish”
- Paquita Hoeck (2006) – “Multiple Mating in Wild Seahorses”
- Brian Face (2003-2004) – “Reproductive Ecology of Seahorses (*Hippocampus abdominalis*)”
- Luke Thompson (2000-2002) – “Microsatellite Analysis of Intraspecific Genetic Variation in Lake Victoria Cichlids”

- **High School Students (12):**
 - Shumaim Fatima (2024) – “Seahorse Health and Reproduction”
 - Veronica Zheng (2024) – “Seahorse Health and Reproduction”
 - Jimmy Wang (2024) – “Seahorse Health and Reproduction”
 - Noa Weiss (2023) – “Juvenile Pipefish Culture”
 - Becky Sloten (2023) – “Juvenile Pipefish Culture”
 - Jacob Louie (2023) – “Seahorse Aquaculture”
 - Dylan Friedman (2022) – “Juvenile Pipefish Culture”
 - Chloe Li (2022) – “Potential Reproductive Rates in Nearshore Pipefish”
 - Laura Wang (2022) – “Potential Reproductive Rates in Nearshore Pipefish”
 - Valerie Voytsekhovskaya (2021) – “Partitioning Relative Parental Investment in Nearshore Pipefish”
 - Stephanie Rakhmonova (2021) - “Partitioning Relative Parental Investment in Nearshore Pipefish”
 - Emily Hui (2015) – “Genetic parentage in the northern pipefish (*Syngnathus fuscus*)”

TEACHING EXPERIENCE:

- Biology Undergraduate Summer School (BUSS), Ecology (BIOL3083) Evolution (BIOL3007W/BIOL70503), Evolutionary Biology, Genetics, Heredity, MacAulay Honors Seminar: Science Forward (MCHC2001), Marine Biology and Oceanography (Field Course), Marine Biology, Molecular Phylogenetics and Evolution (BIOL4025/BIOL70603), Principles of Evolution (BIO364), Population Ecology, Speciation and Phylogeny: Micro to Macro Evolution (BIO226), Topics in Evolutionary Biology (BIO554)

ADMINISTRATIVE EXPERIENCE:

- Faculty Representative, Biology Department Appointments Committee (2022-)
- Departmental Alternate, BC Faculty Council (2022-)
- Departmental Representative, BC Faculty Council (2019-2022)
- College Delegate, CUNY University Faculty Senate (2017-2020)
- College Representative, EEB Steering Committee (Biology Graduate Program) (2015-2021)
- Biology Representative, Urban Sustainability Steering Committee (2013-)
- Faculty Representative, SRIJB Institute Director and Faculty Search Committees (2015)

EDITORIAL EXPERIENCE:

- Panel Reviewer, NSF Research Experiences for Undergraduates Program (2019, 2021, 2023)
- Reviewing Editor, Journal of Evolutionary Biology (2018-2021)
- Editorial Assistant, Canadian Journal of Fisheries and Aquatic Sciences (1997-1998)

REFEREE TO SCIENTIFIC JOURNALS/GRANTING AGENCIES (>200 Reviews):

- Animal Behaviour, Austrian Academy of Science (AT), Behavioral Ecology, Behavioral Ecology and Sociobiology, Bergen Research Foundation, Biological Invasions, Biological Journal of the Linnaean Society, Biology Letters, BMC Genomics, Canadian Journal of Fisheries and Aquatic Sciences, Current Biology, Deutsche Forschungsgemeinschaft (DE), Diversity & Distributions, Ecology and Evolution, Environmental Biology of Fishes, Ethology, Evolution, Fundação para a Ciência e a Tecnologia (PT), Genome Biology and Evolution, Heredity, Hydrobiologia, Journal of Applied Ichthyology, Journal of Biogeography, Journal of Evolutionary Biology, Journal of Experimental Biology, Journal of Fish Biology, Journal of Heredity, Journal of Molecular Evolution, Journal of Molluscan Studies, Journal of Virology, Marine and Freshwater Research, Marine Biology, Marine Ecology Progress Series, Molecular Biology and Evolution, Molecular Ecology, Molecular Immunology, Molecular Phylogenetics and Evolution, National Environmental Research Council (UK), National Geographic Society (US), National Science Foundation (US), Nature, Nature Communications, Neotropical Ichthyology, Netherlands Organisation for Scientific Research (NL), PSC-CUNY Research Award Program, Philosophical Transactions of the Royal Society of London, Proceedings of the Royal Society of London, Public Library of Science ONE, Reproduction, Fertility and Development, Reviews in Fish Biology and Fisheries, Royal Society Open Science, Simulation Modeling: Practice and Theory, Swiss National Science Foundation (CH), Trends in Ecology and Evolution, Zoological Letters

SERVICE:

- **2018** – Symposium Organizer (w/ Jimiane Ashe) –“**Host-Microbe Coevolution in the Sea**” (Marine Evolution 2018, Strömstad, Sweden)
 - **2015** – Aquatic Science Apprentice Program Organizer (World Science Festival, New York, USA)
 - **2008** – Exhibit Contributions –“**Sammelsurium der Tiere – Von der Wunderkammer zur universitären Sammlung**“ (Zoological Museum, University of Zürich)
 - **2007** – Symposium Organizer (w/ Ingrid Ahnesjö) –“**Mating Competition and Sex-role Dynamics**” (ESEB IX, Uppsala, Sweden)
 - **2007** – Exhibit Contributions / Public Lecture –“**Biodiverse Forschung - natürlich vernetzt**” (Zoological Museum, University of Zürich)
-

PROFESSIONAL MEMBERSHIPS:

- European Society for Evolutionary Biology, Society for Integrative and Comparative Biology, Society for Molecular Biology and Evolution, Society for the Study of Evolution, Society of Systematic Biologists, Swiss Zoological Society
-

CONFERENCE / INVITED PRESENTATIONS (2013-):

- **Washington, USA 2023** - DC Comparative Immunology Meeting
- **Guangzhou, China 2021**- Syngnathid Biology International Symposium
- **New York, USA 2019** – Brooklyn College – *Invited Seminar*
- **Groningen, Netherlands 2017** – European Society for Evolutionary Biology Annual Meeting
- **New York, USA 2016** – Hunter College – *Invited Seminar*
- **Perth, Australia 2016** – University of Western Australia – *Invited Seminar*
- **New York, USA 2015** – Columbia University – *Invited Seminar*
- **New York, USA 2014** – International Society of Behavioral Ecology Annual Meeting
- **Raleigh, USA 2014** – Society for the Study of Evolution Annual Meeting
- **New York, USA 2014** – Queens College – *Invited Seminar*
- **New York, USA 2014** – New York University – *Invited Seminar*
- **New York, USA 2013** – City College – *Invited Seminar*
- **New York, USA 2013** – CUNY Animal Behavior Initiative Annual Meeting

CURRENT RESEARCH COLLABORATIONS:

- Ingrid Ahnesjö, University of Uppsala, Uppsala, Sweden
 - Pedro Andrade, University of the Algarve, Faro, Portugal
 - Mariej Ejsmond, Jagiellonian University, Krakow, Poland
 - Martin Flajnik, University of Maryland, Baltimore, USA
 - Matthias Glaubrecht, Humboldt University, Berlin, Germany
 - Jorge Goncalves, University of the Algarve, Faro, Portugal
 - Yiming Li, Chinese Academy of Sciences, China
 - Nuno Monteiro, Research Centre in Biodiversity and Genetic Resources, Vairao, Portugal
 - Axel Meyer, University of Konstanz, Konstanz, Germany
 - Jay Orr, Northwest Fisheries Science Center, Seattle, USA
 - Jacek Radwan, Jagiellonian University, Krakow, Poland
 - Mariella Rasotto, University of Padua, Padua, Italy
 - Lucy Woodall, Natural History Museum, London, UK
-

MEDIA COVERAGE (2000-):

- 2020 – "Happy Father's Day to All the Fish Dads Underwater" *New York Times* (June 21)
 - 2018 – "Parenting in the Animal Kingdom" *The Longest Shortest Time* (August 15)
 - 2017 – "L'Hippocampe" *Découverte (Radio Canada)* (January 22)
 - 2017 – "Where Do Baby Seahorses Come From?" *Science Friday (Public Radio International)* (January 20)
 - 2016 – "Seahorses are some of the strangest fish in the sea. Can their genome tell us why?" *Los Angeles Times* (December 14)
 - 2016 – "Biology Professor Tony Wilson and International Research Team Unravel the Genetic Basis of Male Pregnancy" *Brooklyn College Magazine* 5: 1 (August)
 - 2015 – "Editor's Choice – Like Mother, Like Father" *Science* 350: 53 (October 2)
 - 2015 – "Unraveling the Genetic Basis of Seahorse Male Pregnancy" *Molecular Biology and Evolution* 32: 3278 (September)
 - 2012 – "Das Sexleben der Seepferdchen" *Unimagazin* 2/12: 21-23 (February)
 - 2011 – "Winziger Zuchthengst" *NZZ am Sonntag* (October 2)
 - 2011 – "Was Männchen wollen" *Beobachter Natur* (September)
 - 2009 – "Der Tanz der Seepferdchen" (Podcast) *NZZ Campus* (February 15)
 - 2009 – "Ist ihr Zweck erfüllt, hat auch ihr Leben ein Ende" *NZZ Campus* (February 15)
 - 2008 – "Vorfahren aus dem Meer" *Neue Zürcher Zeitung* (April 30)
 - 2008 – "Meeresflut brachte Tanganjika-Hering" *Focus Online* (April 24)
 - 2008 – "Süsse Fische kommen aus dem Ozean" *Tagesspiegel* (April 24)
 - 2008 – "Mysterium des Tanganjikasees gelöst" *Die Welt* (April 23)
 - 2007 – "Temperature Affects Pipefish Reproduction" *Practical Fishkeeping* (November 28)
 - 2007 – "Rollentausch: Bei den Seepferdchen gebären die Männer" *Echt! Das Wissenschaftsmagazin* (January 23)
 - 2006 – "Männliche Seepferdchen "spucken" 1500 Junge aus" *Nano* (December 4)
 - 2006 – "Seepferdchen: Gebärende Männer" *MTW* (November 9)
 - 2006 – "Mysteriöse Brautsuche unter Wasser" *Tagesanzeiger* 30 (August 8)
 - 2005 – "Schaut her! Ich werde Mama – und bin ein Mann" *Blick* 14-15 (February 24)
 - 2005 – "Jung und Hoffnungsvoll" *Unimagazin* 2/5: 44-47 (February)
 - 2003 – "Bredrohte Seepferdchen" *Spektrum der Wissenschaft* 78-83 (December)
 - 2003 – "Evolutionary Biology - Polygamy and Parenting" *Nature* 424: 23-24 (March 7)
(Mark Pagel's commentary on Wilson et al. (2003))
 - 2002 – "Männchen mit gleicher Färbung sind gefragt" *Tagesspiegel* 17717 (March 26)
 - 2000 – "Editor's Choice - Sexual Selection and Speciation" *Science* 290: 1055 (November 10)
-

PUBLICATION LIST (Total Publications: 50; Citations: 3,399; H-Index: 28):

50. **Wilson AB** (*In Press*) Parental behavior in fish. *In Encyclopedia of Reproduction*, 3rd edition (MK Skinner, ed.), **6**, XXX-XXX. [Scholar Citations: 0]
49. **Wilson AB**, Whittington CM, Meyer A, Scobell S, Gauthier ME (2023) Prolactin and the evolution of male pregnancy. *General and Comparative Endocrinology*. **334**, 114210 [Scholar Citations: 3]
48. Stacy R, Palma J, Correia M, **Wilson AB**, Andrade JP, Castilho R (2021) The paradox of retained genetic diversity of *Hippocampus guttulatus* in the face of demographic decline. *Scientific Reports*. **11**, 10434. 10.1038/s41598-021-89708-0 [Scholar Citations: 1]
47. **Wilson AB**, Ashe J, Padron M, Hamilton H (2021) Comprehensive genus-wide screening of seahorse microsatellites Identifies priority species for conservation assessment. *Conservation Genetics Resources*. **13(2)**, 221-230. 10.1007/s12686-021-01198-4 [Scholar Citations: 6]
46. Moser F, **Wilson AB** (2020) The mechanisms of reproductive isolation in Mediterranean pipefish (*Syngnathus* sp.). *Animal Behaviour*. **161**, 77-87. 10.1016/j.anbehav.2020.01.006. [Scholar Citations: 5]
45. **Wilson AB**, Wegmann A, Ahnesjö I, Gonçalves JMS (2020) The evolution of ecological specialization in a broadly-distributed marine species. *Evolution*. **74**, 629-643. 10.1111/evo.13930. [Scholar Citations: 5]
44. Ashe JL, **Wilson AB** (2020) Navigating the southern seas with small fins: Genetic connectivity of seahorses (*Hippocampus abdominalis*) across the Tasman Sea. *Journal of Biogeography*. **47**, 207-219. 10.1111/jbi.13733. [Scholar Citations: 9]
43. Sutton FB, **Wilson AB** (2019) Where are all the moms? External fertilization predicts the rise of male parental care in bony fishes. *Evolution*. **73**, 2451-2460. 10.1111/evo.13846. [Scholar Citations: 39]
42. Perelmuter JT, **Wilson AB**, Sisneros JA, Forlano PM (2019) Forebrain dopamine system regulates inner ear auditory sensitivity to socially relevant acoustic signals. *Current Biology*. **29**, 2190-2198. 10.1016/j.cub.2019.05.055. [Scholar Citations: 30]
41. Sutton FB, **Wilson AB** (2018) Parental behavior in fish. *In Encyclopedia of Reproduction*, 2nd edition (MK Skinner, ed.), **6**, 106-114. [Scholar Citations: 5]
40. Wang S, Liu C, **Wilson AB**, Li X, Zhu W, Gao X, Liu X, Li Y (2017) Pathogen richness and abundance predict patterns of adaptive MHC variation in insular amphibians. *Molecular Ecology*, **26**, 4671-4685, 10.1111/mec.14242. [Scholar Citations: 33]
39. **Wilson AB** (2017) MHC and adaptive immunity in teleost fishes. *Immunogenetics*, **69**, 521–528, 10.1007/s00251-017-1009-3. [Scholar Citations: 78]
38. Bürkli A, **Wilson AB** (2017) Explaining high-diversity death assemblages: Undersampling of the living community, out-of-habitat transport, time-averaging of rare taxa, and local extinction. *Palaeogeography, Palaeoclimatology, Palaeoecology*, **466**, 174-183. 10.1016/j.palaeo.2016.11.022. [Scholar Citations: 16]
37. Whittington CM, Griffith OW, Qi W, Thompson MB, **Wilson AB** (2015) Seahorse brood pouch transcriptome reveals common genes associated with vertebrate pregnancy. *Molecular Biology and Evolution*, **32(12)**, 3114–3131. 10.1093/molbev/msv177. [Scholar Citations: 122]
36. Ejsmond MJ, Radwan J, **Wilson AB** (2014) Sexual selection and the evolutionary dynamics of the major histocompatibility complex. *Proceedings of the Royal Society of London, Series B*, **281**, 20141662. 10.1098/rspb.2014.1662. [Scholar Citations: 79]
35. **Wilson AB**, Whittington CM, Bahr A (2014) High intralocus variability and interlocus recombination promote immunological diversity in a minimal major histocompatibility system. *BMC Evolutionary Biology*, **14**, 273. 10.1186/s12862-014-0273-1. [Scholar Citations: 6]
34. Whittington CM, **Wilson AB** (2013) The role of prolactin in fish reproduction. *General and Comparative Endocrinology*, **191**, 123-136. [Scholar Citations: 113]
33. Fehr A, Walther E, Schmidt-Posthaus H, Nufer L, **Wilson AB**, Segner H, Pospischi A, Vaughn L (2013) *Candidatus* Syngnamydia venezia, a novel member of the phylum Chlamydiae and a potential model for host-pathogen coevolution. *PLoS One*, **8(8)**, e70853. [Scholar Citations: 49]

32. Whittington CM, Musolf K, Sommer S, **Wilson AB** (2013) Behavioural cues of reproductive status in seahorses (*Hippocampus abdominalis*). *Journal of Fish Biology*, **83**, 220-226. [Scholar Citations: 8]
31. Mwale M, Kaiser H, Barker N, **Wilson AB**, Teske PW (2013) Identification of a uniquely southern African clade of coastal pipefishes (*Syngnathus* spp.). *Journal of Fish Biology*, **82**, 2045-2062. [Scholar Citations: 22]
30. Sommer S, Whittington CM, **Wilson AB** (2012) Standardized classification of pre-release development in male-pregnant pipefish, seahorses, and seadragons (Family Syngnathidae). *BMC Developmental Biology*, **12**, 39. [Scholar Citations: 41]
29. Bahr A, Sommer S, Mattle B, **Wilson AB** (2012) Mutual mate choice in the potbellied seahorse (*Hippocampus abdominalis*). *Behavioral Ecology*, **23**(4), 869-878. [Scholar Citations: 39]
28. Winkler JD, Stolting KN, **Wilson AB** (2012) Sex-specific responses to fecundity selection in the broad-nosed pipefish. *Evolutionary Ecology*, **26**, 701-714. [Scholar Citations: 12]
27. Bahr A, **Wilson AB** (2012) The evolution of MHC diversity: Evidence of intralocus gene conversion and recombination in a single-locus system. *Gene*, **497**, 52-57. [Scholar Citations: 48]
26. Bahr A, **Wilson AB** (2011) The impact of sex-role reversal on the diversity of the major histocompatibility complex: Insights from the seahorse (*Hippocampus abdominalis*). *BMC Evolutionary Biology*, **11**, 121. [Scholar Citations: 19]
25. Hablützel P, **Wilson AB** (2011) Notes on the occurrence of *Syngnathus rostellatus* (Teleostei, Syngnathidae) in the Mediterranean. *Marine Biodiversity Records*, **4**, e57. [Scholar Citations: 14]
24. **Wilson AB**, Orr JW (2011) The evolutionary origins of syngnathid fishes. *Journal of Fish Biology*, **78**, 1603-1623. [Scholar Citations: 107]
23. Stölting KN, Meudt HM, Clarke AC, Blanckenhorn WU, **Wilson AB** (2011) Cost-effective fluorescent amplified fragment length polymorphism analyses using a three primer system. *Molecular Ecology Notes*, **11**, 494-502. [Scholar Citations: 10]
22. **Wilson AB**, Eigenmann Veraguth I (2010) The impact of Pleistocene glaciation across the range of a widespread European coastal species. *Molecular Ecology*, **19**, 4535-4553. [Scholar Citations: 104]
21. Stölting KN, Gort G, Wüst C, **Wilson AB** (2009) Eukaryotic transcriptomics *in silico*: Optimizing cDNA-AFLP efficiency. *BMC Genomics*, **10**, 565. [Scholar Citations: 24]
20. Mattle B, **Wilson AB** (2009) Body size preferences in the pot-bellied seahorse *Hippocampus abdominalis*: Choosy males and indiscriminate females. *Behavioral Ecology and Sociobiology*, **63**, 1403-1420. [Scholar Citations: 39]
19. **Wilson AB** (2009) Opening Pandora's Box: Comparative studies of genetic mating systems reveal reproductive complexity. *Molecular Ecology*, **18**, 1307-1309. [Scholar Citations: 8]
18. **Wilson AB** (2009) Fecundity selection predicts Bergmann's Rule in syngnathid fishes. *Molecular Ecology*, **18**, 1263-1272. [Scholar Citations: 58]
17. **Wilson AB**, Teugels GG, Meyer A (2008) Marine Incursion: The freshwater herring of Lake Tanganyika are the product of a marine invasion into West Africa. *PLoS One*, **3**, e1979. [Scholar Citations: 62]
16. Rispoli VF, **Wilson AB** (2008) Sexual size dimorphism predicts the frequency of multiple mating in the sex-role reversed pipefish *Syngnathus typhle*. *Journal of Evolutionary Biology*, **21**, 30-38. [Scholar Citations: 43]
15. Stölting KN, **Wilson AB** (2007) Male pregnancy in seahorses and pipefish: Beyond the mammalian model. *BioEssays*, **29**, 884-896. [Scholar Citations: 199]
14. **Wilson AB**, Martin-Smith KM (2007) Genetic monogamy despite social promiscuity in the pot-bellied seahorse (*Hippocampus abdominalis*). *Molecular Ecology*, **16**, 2345-2352. [Scholar Citations: 65]
13. Millien V, Lyons KJ, Olsen L, Smith FA, **Wilson AB**, Yom-Tov Y (2006) Ecotypic variation in the context of global climate change: Revisiting the rules. *Ecology Letters*, **9**, 853-869. [Scholar Citations: 492]

12. **Wilson AB** (2006) Genetic signature of recent glaciation on populations of a nearshore marine fish species (*Syngnathus leptorhynchus*). *Molecular Ecology*, **15**, 1857-1871. [Scholar Citations: 80]
11. **Wilson AB** (2006) Interspecies mating in sympatric species of *Syngnathus* pipefish. *Molecular Ecology*, **15**, 809-824. [Scholar Citations: 27]
10. Von Rintelen T, **Wilson AB**, Meyer A, Glaubrecht M (2004) Escalation and trophic specialization drive adaptive radiation of freshwater gastropods in ancient lakes on Sulawesi, Indonesia. *Proceedings of the Royal Society of London, Series B*, **271**, 2522-2550. [Scholar Citations: 178]
9. **Wilson AB**, Glaubrecht M, Meyer A (2004) Ancient lakes as evolutionary reservoirs: Evidence from the thalassoid gastropods of Lake Tanganyika. *Proceedings of the Royal Society of London, Series B*, **271**, 529-536. [Scholar Citations: 151]
8. **Wilson AB**, Ahnesjö I, Vincent A, Meyer A (2003) The dynamics of male brooding, mating patterns and sex-roles in pipefishes and seahorses (Family Syngnathidae). *Evolution*, **57**, 1374-1386. [Scholar Citations: 231]
7. **Wilson AB**, Vincent A, Ahnesjö I, Meyer A (2001) Male pregnancy in seahorses and pipefishes (Family Syngnathidae): Rapid diversification of paternal brood pouch morphology inferred from a molecular phylogeny. *Journal of Heredity*, **92**, 159-166. [Scholar Citations: 224]
6. **Wilson AB**, Noack-Kunmann, K, Meyer A (2000) Incipient speciation in sympatric Nicaraguan crater lake cichlid fishes: Sexual selection versus ecological diversification. *Proceedings of the Royal Society, Series B*, **267**, 2133-2141. [Scholar Citations: 173]
5. Noack K, **Wilson AB**, Meyer A (2000) Broad taxonomic applicability of microsatellites developed for the highly polymorphic neotropical cichlid (*Amphilophus citrinellum*). *Animal Genetics*, **31(2)**, 151-152. [Scholar Citations: 22]
4. **Wilson AB**, Naish K-A, Boulding EG (1999) Multiple dispersal strategies of the invasive quagga mussel *Dreissena bugensis* as revealed by microsatellite analysis. *Canadian Journal of Fisheries and Aquatic Sciences*, **56**, 2248-2261. [Scholar Citations: 104]
3. **Wilson AB**, Boulding, EG, Naish K-A (1999) Characterization of tri- and tetra-nucleotide microsatellite markers in the invasive mollusc, *Dreissena bugensis*. *Molecular Ecology*, **8**, 692-693. [Scholar Citations: 18]
2. Claxton WT, **Wilson AB**, Mackie GL, Boulding EG (1998) A genetic and morphological comparison of shallow and deep water populations of the introduced dreissenid bivalve, *Dreissena bugensis*. *Canadian Journal of Zoology*, **76**, 1269-1276. [Scholar Citations: 157]
1. **Wilson AB**, Boates JS, Snyder M (1997) The genetic isolation of populations of the gammaridean amphipod, *Corophium volutator*, in the Bay of Fundy, Canada. *Molecular Ecology*, **6**, 917-923. [Scholar Citations: 21]

PUBLICATIONS SUBMITTED / IN PREPARATION:

- Wilson AB, Andrade JP, Woodall LC (*In Preparation*) Genetic evaluation of a dramatic population collapse associated with coastal warming. *Molecular Ecology*.
 - Ashe JL, Wilson AB (*In Preparation*) Microbial-host associations in a nearshore marine vertebrate. *Molecular Ecology*.
 - Sutton FB, **Wilson AB** (*In Preparation*). Who cares? The evolution of parental behavior in African cichlids. *Scientific Reports*.
 - **Wilson AB**, Glaubrecht M (*In Preparation*) Cryptic species, cryptic invasions: The invasion history of *Melanoides tuberculata* reveals repeated introductions of highly divergent lineages. *Molecular Ecology*.
-

UNREFEREED SCIENTIFIC REPORTS / CONTRIBUTIONS:

- **Wilson AB** (2017) Fantastic seahorses and where to find them. (Book Review of "Seahorses: A Life-Size Guide to Every Species" by S. Lourie). *Quarterly Review of Biology*, 92(9), 211.
 - **Wilson AB**, Rispoli VF, Stölting KN (2008) Neues im Alten: Zoologische Forchung an Einem Museum im Zeitalter der Biodiversität. pp. 106-115. *In Sammelurium der Tiere: Geschichte und Geschichten des Zoologischen Museums der Universität Zürich*. F. Loetz & A. Steinbrecher, eds. Chronos, Zürich.
 - Meyer A, **Wilson AB** (2001) New takes on old lakes. (Book Review of "Ancient Lakes: Biodiversity, Ecology and Evolution" edited by A.P. Rossiter & H. Kawanabe). *Trends in Ecology and Evolution*, 109.
-