

Jhan Carlos Salazar Salazar

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Research Interests

Mountains have played a pivotal role in shaping ecological and evolutionary patterns for various groups of organisms, rendering them ideal subjects for studying adaptation and evolution patterns. My research centers on unraveling the intricacies of evolution within mountainous terrains, with a specific focus on anole species—a genus of neotropical lizards distinguished by a flag-like appendix on their neck. I am particularly intrigued by understanding how these anole species have evolved to adapt and diversify across the varying elevations of the Colombian Andes.

Education

2019 - present Ph.D. Student; Ecology, Evolution, and Population Biology - Washington University in St. Louis

Advisor: Dr. Jonathan B. Losos

2018 B.S. in Biology and Conservation Biology - Universidad Icesi, Cali, Colombia.

Advisors: Dr. María del Rosario Castañeda and Dr. Gustavo A. Londoño

Appointments

2023 Research Data Support Specialist II; School of Information – The University of Arizona

Advisor: Dr. Cristian Roman-Palacios

2019 - PhD Student; Ecology, Evolution, and Population Biology - Washington University in St. Louis

2019 Lecturer in Zoology lab; Departamento de Ciencias Biológicas; Universidad Icesi.

2018 - 2019 Research assistant; Departamento de Ciencias Biológicas; Universidad Icesi.

Selected Honors, Awards and Grants

2024 Commitment to Diversity and Inclusion award in the Division of Biology and Biomedical Science at Washington University in St. Louis.

2024 Excellence in Research award in the Division of Biology and Biomedical Science at Washington University in St. Louis.

2024 Nominee for the Edward A. Bouchet Graduate Honor Society for the Washington University in St. Louis chapter.

- 2023 Travel grant given by Gans Collection and Charitable Fund, Inc. for the Camp '23: Celebrating 100 years of Charles L. Cap's Classification of the Lizards at the American Museum of Natural History [\$900].
- 2023 3rd place at best Oral Presentation at the IMSD (Initiative to Maximizing Student Development) retreat at Washington University in St. Louis.
- 2019 Afro-Colombian of the Year – Youth Category.
- 2018 Meritorious Undergrad Thesis at Universidad Icesi.
- 2013 Undergrad Icesos Scholarship at Universidad Icesi.

Publications

Published

- Jacobs, J.A., **Salazar, J.C.**, & Winchell, K.M. 2023. A Picture is Worth a Thousand Dollars: A photographic approach to studying color in anoles. *Biological Journal of the Linnean Society*. 2023: blad143. [[pdf](#)]
- Soares, L., Cockle, K., Ruelas Inzunza, E., Ibarra, J.T., Miño, C.I., Zuluaga, S., Bonaccorso, E., Ríos-Orjuela, C., ... **Salazar, J.C.**, ..., Fraga, R.M. & Martins, P. 2023. Neotropical Ornithology: Reckoning with historical assumptions, removing systemic barriers, and reimagining the future. *Ornithological Applications*. 125: 1-30. [[pdf](#)]
- **Salazar, J.C.** & Londoño, G.A. 2022. Nesting biology of the golden-winged manakin (*Masius chrysopterus*), with a review of nesting traits for lowland and highland species of pipridae. *Ornitología Neotropical*. 33: 58-65. [[pdf](#)]
- **Salazar, J.C.**, Castañeda, M. R., Londoño, G.A. & Muñoz, M.M. 2019. Physiological evolution during adaptive radiation: A test of the island effect in *Anolis* lizards. *Evolution* 73: 1241 - 1252 (Issue cover image) * Featured at: [EurekAlert!](#), [Phys.org](#), [ScienceDaily](#), [Anole Annals](#). [[pdf](#)]

Submitted

- **Salazar, J.C.**, Londoño, G.A., Muñoz, M.M. & Castañeda, M.R. 2024. The Andes are a driver of physiological diversity in *Anolis* lizards. *Evolutionary Journal of the Linnean Society*.
- **Salazar, J.C.** & Miles, D.B. 2024. The shape of water: lizards and the desert. *Integrative and Comparative Biology*.

Public Presentation

Oral Presentations

- 2023 Public presentation at the Seminario del Laboratorio de Herpetología at Universidad Autónoma Nacional de México - "Ecología y evolución de la fisiología térmica en los trópicos."
- 2023 Public presentation at the U'23: Celebrating 100 years of Charles L. Cap's *Classification of the Lizards* at the American Museum of Natural History - "Ain't no mountain high enough: Repeated evolution of high elevation specialization in tropical lizards."
- 2023 Public presentation at the IMSD (Initiative to Maximizing Student Development) retreat at Washington University in St. Louis 2023 - "Ain't no mountain high enough: Repeated evolution

- of high elevation specialization in tropical lizards."
- 2023 Public presentation at the Ernst Mayr Symposium at Evolution Conference 2023 - "Ain't no mountain high enough: Repeated evolution of high elevation specialization in tropical lizards"
- 2023 Public presentation at the INSPIRE (Interdisciplinary Conference for Networking, Supporting, and Promoting Inclusive Research Endeavors) conference - "Ain't no mountain high enough: Repeated evolution of high elevation specialization in tropical lizards."
- 2023 Public presentation at the LEC (Living Earth Collaborative) seminar series - "Once upon a time in Colombia: Evolution and ecology of thermal physiology in the Andes."
- 2023 Public presentation for the ABBGS (Association for Black Biomedical Graduate Students) Black history month showcase - "Once upon a time in Colombia: Evolution and ecology of thermal physiology in the Andes"
- 2022 Invited speaker at University of South Florida for the Integrative Biology Seminar series - "Exploring the ecology and evolution of the thermal physiology in the tropics."
- 2022 Public presentation at Universidad Icesi - "Past, present and future: Evolution and ecology of thermal physiology in the Andes"
- 2022 Symposium in "Diversity in Colombian Herpetology" at the Colombian Congress of Herpetology in Cali, Colombia
- 2022 Pasado, presente y futuro: Fisiología térmica en los Andes. Universidad Icesi. (Delivered in Spanish).
- 2021 Congreso Latinoamericano de Evolución (CLEVOL). Ecología y evolución de la fisiología térmica en los trópicos. (Delivered in Spanish).
- 2021 Virtual Evolution 2021 conference. Exploring the ecology and evolution of the thermal physiology in the tropics
- 2018 Institute of Biology Lunch Talk at VirginiaTech. Intra and interspecific variation in Critical Thermal Minimum and Maximum of mainland anole lizards (Reptilia: Squamata: Dactyloidae: *Anolis*) (Undergrad thesis)
- 2017 Poster Presentation Session at Universidad Icesi. ¿Está la eficiencia en el uso del agua asociada con las características de los estomas en el maíz? (Delivered in Spanish).
- 2016 Poster Presentation Session at Purdue University. Is water-use efficiency associated with stomatal traits in maize? (Summer research).

Panels

- 2022 Herpetología Diversa; Conversatorio sobre diversidad e inclusión en la herpetología colombiana: Colectivo Mujeres en la Ciencia Colombiana (Delivered in Spanish).
- 2021 Diversidad, Equidad e Inclusión en Eco-Evo en Latinoamérica; Club Eco-Evo Latinoamerica. (Delivered in Spanish).
- 2021 Herramientas generales de apoyo a la investigación; Universidad Militar Nueva Granada. Ecología y evolución de la fisiología térmica en los trópicos. (Delivered in Spanish).
- 2021 Semana de Divulgación Científica Universidad Icesi. Explorando la ecología y evolución de la fisiología térmica en los trópicos. (Delivered in Spanish).
- 2020 Lagartijas del valle, venid; La ruta de la ciencia – Todo es ciencia: Ministerio de Ciencias de Colombia. (Delivered in Spanish).

Selected Media Coverage

- 2023 “Icesi, una plataforma para el éxito” By *El País* – Icesi 2023. [\[Link\]](#)
- 2023 “Jhan Salazar on The Wonder of Nature & Importance of Representation” By Frank Harris, *British Ecological Society Journals* – Black History Month 2023. [\[Link\]](#)
- 2023 “Life Can’t Get Much Hotter Than This” By Katherine J. Wu, *The Atlantic* – Science. [\[Link\]](#)
- 2020 “Jhan Salazar: Journeys of an Afro-Colombian Ecologist” By Dr. Anna Doty, *Functional Ecologists - A Blog for the People Behind the Research*. [\[Link\]](#)
- 2020 “Temperaturas Críticas” By Dr. Carlos Guarnizo, *Ciencia Café Pa’ Sumercé* (Delivered in Spanish). [\[Link\]](#)
- 2020 “For This Colombian Scientist, Lizards Led to A Life of Science!” By Andrew Wight, *Forbes*. [\[Link\]](#)
- 2019 “EEPB graduate student wins Afro-Colombian of the year award in the Youth category” By Marta Wegorzewska, *WashU News*, 12/2019. [\[Link\]](#)
- 2019 “Biólogo Icesista Publica Artículo en Importante Revista Científica” (Delivered in Spanish). [\[Link\]](#)
- 2019 “Island lizards are expert sunbathers, and researchers find it’s slowing their evolution” by B. Bodensteiner, *Virginia Tech News*. [\[Link\]](#)

Teaching Experience

- 2024 Teaching Assistant; Department of Biology; Washington University in St Louis. *Dr. Joan E. Strassmann*. Behavioral Ecology (Biology 372).
- 2023 Teaching Assistant; Department of Biology; Washington University in St Louis. *Dr. Mark Manteuffel*. Introduction to Ecology (Environmental Studies 381).
- 2021 Teaching Assistant; Department of Biology; Washington University in St Louis. *Dr. Joan E. Strassmann*. Behavioral Ecology (Biology 372).
- 2020 Teaching Assistant; Department of Biology; Washington University in St Louis. *Dr. Swanne Gordon*. Introduction to Ecology (Environmental Studies 381).
- 2019 Lecturer; Departamento de Ciencias Biológicas; Universidad Icesi. *Dr. Leonardo Herrera*. Zoology Laboratory (Ciencias Biológicas 21008).
- 2017 Undergrad Teaching Assistant: Departamento de Ciencias Biológicas; Universidad Icesi. *Dr. Juliana Rengifo*. Cell Biology Laboratory (Ciencias Biológicas 21008).
- 2016 – 2017 Undergrad Teaching Assistant: Departamento de Ciencias Biológicas; Universidad Icesi. *Dr. Edgar Barrera*. Biotechnology Laboratory (Ciencias Biológicas 21006).
- 2016 Undergrad Teaching Assistant: Departamento de Ciencias Biológicas; Universidad Icesi. *Dr. Gustavo A. Londoño*. Vertebrate Biology Laboratory (Ciencias Biológicas 21123).
- 2014 – 2015 Undergrad Teaching Assistant: Departamento de Ciencias Biológicas; Universidad Icesi. *Dr. Leonardo Herrera*. Zoology Laboratory (Ciencias Biológicas 21008).

Research Experience

- 2018 Research Assistant: Departamento de Ciencias Biológicas; Universidad Icesi. “The impact of

climate change on the ecological functionality and the restoration of the tropical dry forest”.

Dr. María Camila Pizano

2016-2017 Undergraduate Thesis: Departamento de Ciencias Biológicas; Universidad Icesi. “Intra and interspecific variation in Critical Thermal Minimum and Maximum of mainland anole lizards (Reptilia: Squamata: Dactyloidae: Anolis)”. *Dr. María del Rosario Castañeda* and *Dr. Gustavo A. Londoño*.

2015-2016 Undergraduate Research Assistant: Departamento de Ciencias Biológicas; Universidad Icesi. “Avian Nesting Ecology along an Elevational Andean Gradient”. *Dr. Gustavo A. Londoño*.

Academic Service

2023 - present Secretary, ABBGS (Association for Black Biomedical Graduate Students) at Washington University in St. Louis

2023 - present Communication Committee Assistant at the Society of Systematic Biology.

2023 - present Programming Coordinator, SACNAS and GALNACS (Society for Advancement of Chicanos/Hispanics & Native Americans in Science/ Graduate Association of Latinx, Native American and Caribbean Students) at Washington University in St. Louis

2021 - present Graduate Student Representative at the DEI in the Department of Biology at Washington University in St. Louis

2021- 2023 Graduate Student Representative at the Society of Systematic Biology.

Mentoring of Students

Head leader of the Herpetology Student Club. Universidad Icesi, Cali, Colombia; Supervisor: Gustavo A. Londoño PhD.

Students Advised and Student Committees

Master Student Committees

2021-present Estefany Acosta Lugo (Universidad Militar Nueva Granada, Bogotá - Colombia)

Undergraduate mentees

2024 – present Marsha Bustos Hernández (Universidad de Córdoba, Montería - Colombia)

2020-2021 Camilo Andrés Estupiñán Orozco (Universidad Icesi, Cali - Colombia)

2022- present Pablo Ortega (Universidad Icesi, Cali - Colombia)

Workshops, Internships and Courses

- 2024 Leadership and Management in Action Program (L-MAP). At Washington University in St. Louis, USA.
- 2022 Teaching Orientation Workshop in “Fostering an Inclusive Classroom Climate”. At Washington University in St. Louis, USA.
- 2021 Teaching Orientation Workshop in “Facilitating Challenging Conversations”. At Washington University in St. Louis, USA.
- 2021 Teaching Orientation Workshop in “Who's In Charge”. At Washington University in St. Louis, USA.
- 2020 Teaching Orientation Workshop in “Providing Verbal Feedback”. At Washington University in St. Louis, USA.
- 2020 Teaching Orientation Workshop in “Asking Questions to Improve Learning”. At Washington University in St. Louis, USA.
- 2019 Teaching Certificate in “Colombian University Level Teaching”. At Universidad Icesi, Cali.
- 2017 - 2018 (Winter): Ecology and Evolutionary Biology. *Dr. Martha M. Muñoz*. Virginia Polytechnic Institute and State University, Blacksburg, VA, at Muñoz Lab.
- 2017 Advance Comparative Phylogenetic Methods in R. *Dr. Liam J. Revell* (University of Massachusetts Boston). At Universidad del Valle.
- 2016 Comparative Phylogenetic Methods in R. *Dr. Julie M. Allen* (University of Nevada, Reno). At Universidad Icesi.
- 2016 (Summer): Botany and Plant Pathology. *Dr. Michael V. Mickelbart*. Purdue University, West Lafayette, IN, at Mickelbart Lab
- 2015 Basics in R. *Dr. Julie M. Allen* (University of Illinois). At Universidad Icesi.

Peer Review

Reviewer for: *Oikos*, *Herpetological Conservation and Biology*, *Oecologia*, *Functional Ecology*, *Food Webs*, *Neotropical Ornithology*.

Society Membership

Herpetologists' League, 2021 to present, student member.

Society of Systematic Biologists, 2019 to present, graduate student representative.

Society for the Study of Evolution, 2020 to present, student member.