# ESCALANTE MEZA, IGNACIO – CURRICULUM VITAE

iem@uic.edu | (1) 510 701 9670 | http://iescalante.weebly.com Department of Biological Sciences, University of Illinois – Chicago 840 W Taylor St. Chicago, IL, USA. 60607

# **ACADEMIC HISTORY**

2022-present. Postdoctoral Fellow.

Bridge to Faculty program. Department of Biological Sciences, University of Illinois – Chicago.

2022-present. Research Associate.

Negaunee Integrative Research Center. Field Museum of Natural History, Chicago, IL, USA.

2020-2022. Postdoctoral Research Associate.

Department of Biological Sciences. University of Wisconsin – Milwaukee. Advisor: Rafael L. Rodríguez.

2014-2020. Ph.D., Environmental Science, Policy, and Management.

Department of Environmental Science, Policy, and Management. University of California – Berkeley. Advisor: Damian O Elias.

Topic: Compensating for damage: the mechanical, behavioral, and ecological consequences of losing legs for harvestmen. A summary <u>here</u>.

2009-2013. M.Sc., Biology, graduated with honors.

Department of Biology, Universidad de Costa Rica. Advisor: William G Eberhard.

Topic: Ontogeny of the feeding behavior in cellar spiders.

2004-2008. B.S., Biology.

Department of Biology, Universidad de Costa Rica.

#### RELEVANT SKILLS

- Teaching & mentoring | Lecture, lab, field courses, syllabus design, research mentorship
- Field & lab research | Animal behavior, ecology, cognition, tropical ecology, biomechanics, and physiology
- Data analysis & visualization | Coding (R, MatLab), web design, Tableau, Microsoft Office
- Science communication | Peer-reviewed writing, outreach, and online resources
- Team management | Planning, organizing, and managing groups, assets, and events
- Curriculum assessment | Stating outcomes, mapping learning/curriculum, and educational evaluation design
- Evaluation methods | Focus group facilitation and design, survey design and analysis

# PEER-REVIEWED PUBLICATIONS

Google scholar profile here.

- 26. **Escalante I**, JR Kellner, RL Rodríguez, C Desjonquères. 2022. A female mimic signal type in the vibrational repertoire of male *Enchenopa* treehoppers. <u>Behaviour 159:1319-1340</u>.
- 25. Raspotnig, G, A Hüfner, M. Bodner, J Blesl, M. Schaider, I Escalante, and O Kunert. 2022. Polymorphic scent gland secretions in *Nelima* harvestmen: "Sclerosomatid compounds" but different chemical lineages. Frontiers in Ecology and Evolution 10:993368. DOI: 10.3389/fevo.2022.993368 \* Invited contribution to the special topic *Chemical Ecology of Arthropods, Plants, and Fungi: Bioactivity and Importance of Natural Products*.

- 24. **Escalante I,** and DO Elias. 2022. Robustness in action: Leg loss does not affect mating success in male harvestmen. Behavioral Ecology and Sociobiology 76:20. Dataset publicly available here on Dryad.
- 23. **Escalante I**, M Domínguez, D Gómez-Ruiz, and G Machado. 2022. Benefits and costs of multi-specific aggregations in harvestmen (Arachnida: Opiliones). <u>Frontiers in Ecology and Evolution 9:766323</u>. The dataset is publicly available <u>here on Dryad.</u> \* Invited contribution to the special topic *Social Invertebrates as Models for Non-kin Cooperation*.
- 22. **Escalante I,** and DO Elias. 2021. The type of leg lost affects habitat use but not survival in a non-regenerating arthropod. <u>Ecology and Evolution 11(15): 10672-10685</u>. The dataset is publicly available <u>here on Dryad.</u>
- 21. **Escalante I,** VR Ellis, and DO Elias. 2021. Leg loss decreases endurance and increases oxygen consumption during locomotion in harvestmen. <u>Journal of Comparative Physiology A 207:257-268</u>. The dataset is publicly available <u>here on Dryad</u>. \*Invited contribution to the Special Issue *Arachnid Kinematics and Locomotion*.
- 20. **Escalante I,** MA Badger, and DO Elias. 2020. Rapid recovery of locomotor performance after leg loss. Scientific Reports 10: 13747. The dataset is publicly available here on Dryad.
- 19. **Escalante I.** 2019. *Preprint*. Chemical ecology and communication of Eupnoi harvestmen. <u>PeerJ</u> Preprints 7:e27778v1
- 18. Emberts, Z, **I Escalante**, and W Bateman. 2019. The ecology and evolution of autotomy. <u>Biological Reviews</u> 94: 1881-1896.
- 17. **Escalante I,** MA Badger, and DO Elias. 2019. Variation in movement: multiple locomotor gaits in Neotropical harvestmen. <u>Biological Journal of the Linnean Society 127:493-507</u>. This paper received an **honorable mention** in the Organization for Tropical Studies Outstanding Student Paper Award 2019-20 competition.
- 16. Domínguez M, I Escalante, F Carrasco-Rueda, CE Figuerola, MM Ayup, N Umaña, D Ramos, A González, C Brizuela, W Delgado, and J Pacheco. 2016. Losing legs and walking hard: effects of autotomy and substrate roughness in the locomotion of *Prionostemma* spp. harvestmen. <u>Journal of Arachnology 44: 76-82</u>
- 15. Coelho L, **I Escalante**, and A Aisenberg. 2015. Mordidas cariñosas: descripción de cortejo y cópula en la araña escupidora *Scytodes globula* (Scytodidae). Boletín Sociedad Zoológica del Uruguay 24: 146-157
- 14. **Escalante I.** 2015. Predatory behaviour is plastic according to prey difficulty in naïve spiderlings. <u>Journal of Insect Behavior 28: 635-650</u>
- 13. **Escalante I,** A Aisenberg, and FG Costa. 2015. Risky behaviors by the host could favor araneophagy of the spitting spider *Scytodes globula* on the hacklemesh weaver *Metaltella simoni*. <u>Journal of Ethology 33: 125-136</u>
- 12. Hebets EA, A Aceves, S Aguilar, VP Bingman, **I Escalante**, EJ Gering, JA Sánchez-Ruiz, L Segura, V Settepani, DD Wiegmann, and J Stafstrom. 2014. Multimodal sensory reliance in the nocturnal homing of the amblypygid *Phrynus pseudoparvulus* (Class Arachnida, Order Amblypygi)? <u>Behavioral Processes 108:</u> 123-130
- 11. **Escalante I** and M Masís-Calvo. 2014. The absence of gumfoot threads in webs of early juveniles and males of *Physocyclus globosus* (Pholcidae) is not associated with spigot morphology. Arachnology 16: 214-218
- 10. **Escalante I,** A Albín and A Aisenberg. 2013. Lacking sensory (rather that locomotive) legs affects locomotion but not food detection in the harvestman *Holmbergiana weyenberghi*. Canadian Journal of Zoology 91:726-731
- 9. **Escalante I**. 2013c. Protected nests in Acacia trees possibly avoid vertebrate predation in the Rufous-napped Wren (*Campylorhynchus rufinucha*: Passeriformes: Troglodytidae). <u>Ornitología Colombiana 13: 13-20</u>
- 8. **Escalante I**. 2013b. Comportamiento de canto, descripción de las vocalizaciones y su posible variación geográfica en Costa Rica en *Myiothlypis fulvicauda* (Parulidae: Aves). <u>Zeledonia 17: 35-53</u>
- 7. **Escalante I.** 2013a. Ontogenetic and sexual differences in exploration and web construction in the spider *Physocyclus globosus* (Pholcidae). <u>Arachnology 16: 61-67</u>
- 6. Esquivel C, **I Escalante** and WG Eberhard. 2012. The effect of regurgitated digestive fluid on the spider's own legs in *Philoponella vicina* (Araneae: Uloboridae). <u>Journal of Arachnology 40: 146-148</u>
- 5. Clark C.J, TJ Feo and **I Escalante.** 2011. Courtship display and natural history of the Scintillant (*Selasphorus scintilla*) and Volcano (*S. flammula*) Hummingbirds. Wilson Journal of Ornithology 123: 218-228
- 4. Sandoval L and **I Escalante.** 2011. Song variation and spatial similarity in males of the Common Pauraquee (*Nyctidromus albicolliis*). Ornitología Neotropical 22:173-185

- 3. Moya J, R Quesada, W Eberhard, G Barrantes, **I Escalante**, C Esquivel, A Rojas, E Triana and A Arias. 2010. Egg sac construction by folding dead leaves in *Pozonia nigroventris* and *Micrathena* sp. (Araneae, Araneidae). Journal of Arachnology 38: 371-373
- 2. Sandoval L and I Escalante. 2010. Nest description of the Garden Emerald (*Chlorostilbon assimilis*) from Costa Rica. Wilson Journal of Ornithology 122: 597-599
- 1. **Escalante I** and L Sandoval. 2007. Primeros registros del Piquero Patirrojo (*Sula sula*) en las costas del Pacífico Norte y el Caribe de Costa Rica. <u>Boletín Sociedad Antioqueña de Ornitología 17:138-140.</u>

# MANUSCRIPTS IN REVIEW

- 1. Desjonquères C, B Speck, S Seidita, LA Cirino, **I Escalante**, (...) RL Rodríguez. Social plasticity enhances signal-preference co-divergence. *The American Naturalist. In revision*, 5 August 2022.
- Escalante I, J Keller, C Desjonquères, GM Noffsinger, LA Cirino, AA Noriega Rodríguez, SA DeLong, RL Rodríguez. The reproductive function of a female-mimic signal type in the vibrational repertoire of male treehoppers. Submitted to the Journal of Evolutionary Biology, 13 January, 2023.

# **OUTREACH: PUBLICATIONS**

- 2022, November. "Estudiando Afuera." I wrote a summary of interviews to 7 researchers regarding the experience of going abroad for research internships and graduate school. <u>Document here</u>, available through the Latin American Network of Emergent Arachnologists (RAEL).
- 2022, June. "La importancia de los congresos". I wrote a summary of a panel we hosted through the Latin American Network of Emergent Arachnologists (RAEL) about the importance of scientific conferences. Summary here.
- 2022, January. "Consiguiendo financiamiento para estudios científicos". I wrote a summary of a panel we hosted through the Latin American Network of Emergent Arachnologists (RAEL) about funding scientific projects and education. Summary here.
- 2018, October. "How mentorship and Dissertation Research Feed Each Other." A **piece I wrote** about my **research and mentorship** for UC Berkeley's Graduate Division. <u>Article here</u>.
- 2017, November. "Tropical Biology and a Fragmented Landscape." A **piece I wrote** about my research in Costa Rica for UC Berkeley's Graduate Division. <u>Article here</u>.
- 2017. "Arañas que atacan a otras arañas" theme box. Escalante, I, & F. Soley, *in* Aisenberg, A., Toscano-Gadea, C. A., & Ghione, S. (eds). *Guía de arácnidos del Uruguay* 2<sup>nd</sup> edition (*In press*).
- 2017, March. I prepared a field guide to *Habronattus* jumping spiders of Arizona. Guide here.
- 2017, March. Outreach **posters**. In collaboration with Darko Cotoras, I created and illustrated three outreach biodiversity posters/guides about the diversity of arachnids of Costa Rica and Panamá. Posters <u>here</u>.
- 2016, October. "Tropical Biology and Ships." A **piece I wrote** about my research in Panama for UC Berkeley's Graduate Division. Article here.
- 2010. Escalante, I. El canto de la reinita *Phaeothlypis fulvicauda*. Boletín Avis 5: 13–15.
- 2009. Escalante, I. Campylorhynchus rufinucha. Boletín Avis, Unión de Ornitólogos de Costa Rica 3: 5-6.
- 2008. Escalante, I. Abundancia, uso de sustrato y forrajeo agrupado de aves limícolas en una playa lodosa intermareal. <u>Journal of Undergraduate Research Opportunities</u>. <u>University of Georgia</u>.

# FELLOWSHIPS AND AWARDS

- 2019. Outstanding Graduate Student **Instructor** (GSI) Award. Granted by the GSI Teaching and Resources Center at the Graduate Division, UC Berkeley. The award recognized my exceptional achievements as a teacher, particularly in the Animal Behavior class during Fall of 2018.
- 2019. **Continuing Fellowship**. Granted by the Department of Environmental Sciences, Policy, and Management at UC Berkeley. The fellowship provided financial support for dissertation writing in entomology.
- 2018. Graduate Student **Assessment** Fellow. Center for Teaching and Learning, University of California Berkeley. Spring 2018. I was trained in curriculum assessment and evaluation methods in higher education. I

- also collaborated with the College of Natural Resources undergraduate advising team by evaluating the recently established **online advising** platform for incoming students. Information <u>here</u>.
- 2015. Short-term Fellowship, \$3 000. Granted by the **Smithsonian Tropical Research Institute**. To cover **research** expenses, travel, and field work in Barro Colorado Island, Panamá. Topic: "Compensatory behaviors in locomotive performance induced by autotomy in *Prionostemma* daddy long-legs (Arachnida: Opiliones)."
- 2013 2015. Fulbright Foreign Student Program, \$40 000. Granted by the Bureau of Educational and Cultural Affairs of the Department of State of the United States of America. The fellowship partially funded my Ph.D. program.

# GRANTS: EXTRAMURAL

- 2022. National Geographic Grants Level II. \$100,000. *Submitted proposal*, 11 October 2022. Collaborative Proposal: Following evolutionary traces of nuptial gifts in spiders: sexual selection and environment. I contributed to the experimental design and proposal writing, along with the lead PI: María José Albo (Universidad de la República, Uruguay).
- 2022. US National Science Foundation (NSF), Division of Integrative Organismal System (IOS), Animal Behavior Cluster. \$1.4 million. *Submitted full proposal*, 7 July 2022. Collaborative Research: How mites exploit hummingbird-plant mutualisms: Behavioral and functional mechanisms. I co-wrote the proposal with PIs A. Rico-Guevara and O. Combita-Heredia (U Washington), R. Colwell (CU-Boulder), and E. Braker (OTS).
- 2018. Travel Grant, \$500. Granted by the International Society for Behavioral Ecology to attend the XVII **meeting** of the International Society of Behavioral Ecology in Minneapolis, MN, USA, 11-16 August 2018.
- 2017. **Diversity** Award. \$125. Given by the Animal Behavior Society of the United States of America to cover the registration for the 54<sup>th</sup> Animal Behavior Society Meeting in Toronto, Canada. June 12-16, 2017.
- 2017. Glaxo Centro America Fellowship. \$4 650. Granted by the Organization for Tropical Studies to conduct **fieldwork research** in Costa Rica in the summer of 2017. Topic: "Compensation for bodily damage: consequences of losing legs in habitat use and sexual behavior in daddy long-legs."
- 2016. Arachnological Research Fund, \$325. Granted by the American Arachnological Society to cover **research expenses** for the summer 2016 field season in Panamá.
- 2016. Travel Grant, \$2 000. Granted by the International Society for Behavioral Ecology to attend the XVI **meeting** of the International Society of Behavioral Ecology in Exeter, England, 28 July 3 August 2016.
- 2014. Travel Grant, \$1 250. Granted by the International Society for Behavioral Ecology to attend the XV **meeting** of the International Society of Behavioral Ecology in New York City, 31 July 5 August 2014; in which I presented a poster.
- 2013. Pilot **Research** Fellowship Grant \$1 726. Granted by the Organization for Tropical Studies to conduct exploratory research.
- 2013. Diversity Award and Latin American Travel Grant. \$720. Granted by the Animal Behavior Society of the United States of America. These grants partially covered the expenses to attend the Animal Behavior Society **Meeting** in Boulder, Colorado, USA, from 28 July 1 August 2013.
- 2010. Alexander F. Skutch for ornithological **research** in Costa Rica fund. \$600. Granted by the Costa Rican Ornithological Association. Topic: "River noise interference avoidance in the songs of the Buff-rumped warbler (*Phaeothlypis fulvicauda*)."
- 2008. Financial **Support for Education**. \$1 500. Granted by the Ministerio de Ciencia y Tecnología of Costa Rica. To attend a field course in Costa Rica.

#### **GRANTS: INTRAMURAL**

- 2022. Bridge to Faculty Research Support. \$20,000 from the Department of Biological Sciences, University of Illinois Chicago. Funding was intended to cover research expenses and professional development.
- 2018. Berkeley Distinguished Fellow **video contest**. Second Prize winner, \$1000 in travel research funds, for producing a 2 min video about my work as a graduate student. Granted by the Graduate Division, University of California Berkeley Video here.
- 2017. Graduate Division Conference Travel Grant. \$1 290. Granted by Graduate Division, UC Berkeley, to attend the V Latin-American **Congress** of Arachnology in Minas Gerais, Brazil, in December 2017.

- 2017. Bob Lane and Sandy Purcell Graduate Summer Award. \$ 3 500. Granted by the division of Organisms and Environment, Department of ESPM, UC Berkeley, to cover field **research expenses**.
- 2016. Travel Grant, \$525. Granted by the Department of Environmental Sciences, Policy and Management at UC Berkeley to attend the International **Congress** of Arachnology in Colorado, USA, July 2-9, 2016.
- 2016. Tinker Field Research Grant, \$ 700. Granted by the Center of Latin American Studies at UC Berkeley to cover **research expenses** for the summer 2016 field season in Panamá.
- 2016. Pre-dissertation Research Grant, \$1 530. Granted by the Institute for International Studies (IIS) at UC Berkeley to cover **research expenses** for the summer 2016 field season in Panamá.
- 2016. Conference Travel Grant. \$1 145. Granted by Graduate Division, UC Berkeley. Used to attend the XVI International Society of Behavioral Ecology meeting in Exeter, England, from 28 July to 3 August 2016.
- 2016 and 2019. Souja Graduate Student Prize. Granted by the division of Organisms and Environment, Department of ESPM, UC Berkeley, to cover **field research** expenses. \$ 1 000 and \$1 500, respectively.
- 2015. Spieth Travel Award, \$750. Granted by Dr. Phillip Spieth, UC Berkeley. Travel to the Society for Integrative and Comparative 2016 **Meeting** in Portland, Oregon, USA.
- 2015, 2016, 2017, 2018, and 2019. Margaret C. Walker Fund for Teaching and **Research in Systematic Entomology**. Essig Museum of Entomology, UC Berkeley. To cover research expenses, \$1 000-\$2 000 / cycle.
- 2014. Starter Grant Program, \$1 000. Granted by the Department of Environmental Science, Policy, and Management, UC Berkeley. To cover **research** expenses.

# TEACHING EXPERIENCE: LECTURER POSITIONS

- **Behavioral and Molecular Ecology** journal club coordination. Spring 2022. Department of Biological Sciences, University of Wisconsin Milwaukee. I organized the schedule for this 20 people group, invited speakers, and led sessions regarding conversations regarding the job market.
- **Wildlife Ethology**, Spring 2014, Veterinary Sciences Program, Universidad Nacional de Costa Rica; Specialty course for 12 Master's students. I designed the syllabus, conducted lectures and office hours, evaluated and gave feedback on student work, and organized two multi-day field trips.
- **Society & Environment**, Fall 2013, University Studies Abroad Consortium University of Nevada Reno. Alajuela, Costa Rica, lower-division course for ten students from US universities studying abroad. I revised the syllabus, conducted lectures and office hours, organized class presentations, and evaluated and gave feedback on student work.
- General Ecology, and General Ecology Lab. 2013. Universidad de Costa Rica Campus Paraíso, upper-division course for 22 students. I designed the syllabi, conducted lectures, labs, workshops on computer tools, and office hours, evaluated and gave feedback on student work, and implemented classroom accommodations.
- **Introductory Biology,** Fall 2013 and Spring 2014, Department of Biology, Universidad de Costa Rica; introductory, lower-division course for ~100 non-majors. I conducted lectures and office hours, evaluated and gave feedback on student work, and implemented classroom accommodations.
- **Animal Behavior,** Spring 2014, Department of Biology, Universidad de Costa Rica; elective upper-division course for 20 Biology majors. I co-design the syllabus, selected course content, designed classroom activities, conducted lectures and office hours, and evaluated and gave feedback on student work.
- **Seminar of Animal Foraging**, Fall 2013, Department of Biology, Universidad de Costa Rica; elective course for upper-division and Master's students. I designed the syllabus, conducted lectures and office hours, evaluated and gave feedback on student work, and implemented academic accommodations.
- **Biostatistics**, and **Research in Wildlife Management**. 2013. Universidad Técnica Nacional, Alajuela, Costa Rica; upper-division course for 20 students. I revised the syllabi, conducted lectures, workshops on computer tools, and office hours, organized class presentations, and evaluated and gave feedback on student work.
- **General Ecology and Biostatistics**. 2011. Universidad Latina de Costa Rica; upper-division course for 15 students. I revised the syllabi, conducted lectures, workshops on computer tools, and office hours, organized class presentations, and evaluated and gave feedback on student work.
- **Tropical Biology** undergraduate course, Organization for Tropical Studies (OTS) and Duke University. 2010, 2011, and 2012. OTS graduate course Ecología Tropical & Conservación, January 2012, 2013, 2014, and 2016. I served as a guest professor in these field classes by giving lectures, leading field exercises, and supervising the field research project of 15-20 undergraduate and graduate students from institutions in the US and several countries in Latin America.

- Animal Behavior (IB 144), Fall 2018, and Fall 2019. Department of Integrative Biology, UC Berkeley; upper-division course for biology and ecology majors. I conducted discussion sections and office hours, evaluated and provided feedback on student work, designed classroom activities (lesson plans and selected course content), and implemented academic accommodations. For my work in this class, I obtained the 2019 Outstanding Graduate Student Instructor (GSI) Award from the Teaching and Resources Center at the Graduate Division, UC Berkeley.
- Biology and Geomorphology of Tropical Islands (ESPM C107), Fall 2016, Department of Environmental Sciences, Policy and Management, UC Berkeley; upper-division course for majors was held at the Gump Station, Mo'orea, French Polynesia. I supported the logistics of the class (transportation, food, lodging, equipment, and field exercises), helped students in experimental design, data gathering, analysis, and presentation, evaluated and provided feedback on their work, organized a final project symposium, and conducted a statistical analysis workshop.
- Introduction to Culture and Natural Resource Management (ESPM 50AC), Fall 2015 and Spring 2016, Department of Environmental Sciences, Policy and Management, UC Berkeley; introductory American Cultures lower- and upper-division course. I served as the "lead GSI" in the Spring of 2016. The tasks included organizing the online platform and supervising logistics for the 13 sections and ~400 students. I conducted discussion sections and office hours, evaluated and provided feedback on student work, designed classroom activities, and implemented academic accommodations.
- **Tropical Biology: An Ecological Approach**, Organization for Tropical Studies (OTS) and Duke University. Six weeks during 2011, 2012, and 2013. This field ecology course was taught in Costa Rica to graduate students from US institutions. I supported the logistics of the class (transportation, food, lodging, equipment, and field exercises), helped students in experimental design, data gathering, analysis, and presentation, evaluated and provided feedback on their work, and organized a final project symposium.
- Introductory Biology I & II, General Zoology Lab, and General Ecology Lab, from Spring 2006 through June 2011, Department of Biology, Universidad de Costa Rica. These were lower- or upper-division courses for 15-30 biology major students. I conducted discussion sections and office hours, evaluated and provided feedback on student work, designed classroom activities such as lesson plans, lab, and field exercises, selected course content and implemented academic accommodations.

#### PROFESSIONAL EXPERIENCE

- Certificate of Teaching and Learning in Higher Education. Granted by The Teaching and Resource Center, at The Graduate Division, University of California Berkeley. 2020. More information is here. I compiled a Teaching Portfolio with a statement of teaching philosophy, a sample original syllabus, a summary and assessment of my teaching experience, feedback on my teaching, and formal training on teaching. The portfolio is available on demand.
- Community Events and Inclusion Coordinator, Department of Environmental Science, Policy and Management (ESPM), University of California Berkeley. September 2018 December 2019. I developed a 3-axes professional development plan: (1) inclusion and success in graduate school milestones (qualifying exam and dissertation progress mostly), (2) compiling and establishing professional networks with alumni/ae, and (3) academic and non-academic careers exploration and professional development. I created on-campus support networks between students, departmental leadership, and campus resources (Graduate Division and the Career Center). I organized seven events, including online surveys, outlets, and professional development panels.
- **Data analysis and visualization consultant**. Spring 2018. I compiled, analyzed, and prepared visualization outlets for global trade data for professor Kate O'Neill from the ESPM department at UC Berkeley.
- Graduate Student Representative, **Professional Development Committee. Department** of Environmental Science, Policy and Management, University of California Berkeley. Spring 2019 Spring 2020. I participated in the ESPM Professional Development Needs Assessment by suggesting questions, advertising it, helping GradPro and ESPM's leadership digest and distribute the information, and strategizing changes and improvements.

- Graduate Student Representative, **Graduate Program Committee**, ESPM department, UC Berkeley. Fall 2019 Spring 2020. I participated in discussions regarding program funding, requirements, and admissions.
- **Reviewer**, graduate program **admission committee**, department of Environmental Science, Policy & Management, University of California Berkeley. Fall 2015 and Fall 2019. I evaluated and ranked the application material for applicants in the division of Organisms and Environment.
- **Reviewer**, one **book chapter** in "Cryptic female choice in arthropods: patterns, mechanisms, and prospects." A.V. Peretti and A. Aisenberg (eds). Springer International Publishing, 2014.
- Referee for peer-reviewed manuscripts for Ornitología Neotropical 2011; Ecología Austral 2014, 2015, 2016, 2022, Boletín Sociedad Zoológica del Uruguay 2015, Behavioral Ecology & Sociobiology 2015, Journal of Ethology 2015, 2016, Entomologia Experimentalis et Applicata 2016, Ethology 2018, 2020, Evolution & Development 2019, Biological Journal of the Linnean Society 2020, 2021, 2022, Animal Behavior 2020, Arachnology 2020, Applied Animal Behaviour Science 2021, Biological Invasions 2022, Philosophical Transactions of the Royal Society B: Biological Sciences 2022, Journal of Arachnology, 2022.
- **Curator assistant**: Laboratory of Bioacoustics, Zoology Museum, Department of Biology, Universidad de Costa Rica. 2009-2011.
- **Field assistant**, course: Ecology & Climate Change; Education Abroad Program ELON University, NC, USA. Held in the highland, Costa Rica. 2009 & 2010.
- **Field Assistant**, research: Swine influence in Costa Rican wetlands. Medical Veterinary School, Universidad Nacional de Costa Rica. 2009.
- **Field Assistant**, research: The mechanics and evolution of courtship sounds of hummingbirds. Department of Ecology and Evolutionary Biology, Yale University, Connecticut, USA. Fieldwork in highlands, Costa Rica. 2009.

# MENTORSHIP EXPERIENCE

- **Mentor**, Broadening Participation Mentorship Program, hosted by the Society for Integrative and Comparative Biology (SICB). December 2022 February 2023. I mentored one graduate student for their participation and scientific presentation in the SICB 2023 meeting, with one-to-one meetings, networking, and professional development support.
- **Peer-mentor**, Weaving the Future of Animal Behavior (WFAB) program, hosted by the Animal Behavior Society (E. Martins, coordinator). July 2022 August 2023. I participated in online and in-person workshops to support early career investigators in our transition to academic positions.
- **Research mentor**, Support for Undergraduate Research Fellows (SURF). Office of Undergraduate Research, University of Wisconsin Milwaukee. Summer and Fall 2021, Spring and Summer 2022. I mentored one student in all stages of research. Students received financial support from the program.
- Professional development mentor. Berkeley Connect Undergraduate Program. Department of Environmental Science, Policy, and Management, University of California Berkeley. Fall 2017, Spring 2018, Summer 2019, and 2020. I mentored two groups of ~20 lower- and upper-division undergraduate students in professional development and academic advising. Students mainly were from underrepresented minorities (URM) in science, international, transfer, and other non-traditional populations. I designed lesson plans for group meetings, selected course content, and conducted one-to-one meetings. The Communications Office of UC Berkeley's College of Natural Resources wrote a piece about the program, including my participation. <a href="Article here">Article here</a>. The Summer 2019 version was the first time the program was offered to incoming freshmen URM students. Hence, I was highly involved in the curriculum design and evaluation, as we repeated in the Summer of 2020.
- **Research mentor**, Student Mentoring, and Research Teams (SMART). Graduate Division, University of California Berkeley. Summer 2018 and Summer 2019. I mentored three UC Berkeley undergraduate students in all stages of research. More information about my experience is here.
- **Research mentor**. Organization for Tropical Studies (OTS). Research Experience for Undergraduates (REU). Summer 2015. La Selva Biological Station, Costa Rica. I mentored two undergraduate students from the University of Puerto Rico in all the main stages of field research. Two manuscripts are in preparation for submission to peer-reviewed journals. During the program, I also served as a panelist on a 'How to get into graduate school' panel.

- Research mentor. University of California Berkeley. College of Natural Resources. Program: Sponsored Projects for Undergraduate Research. Five semesters between Spring 2015 and Spring 2018, totaling eight undergraduate mentees. Funding: \$500 for each student. Students participated in research projects under my supervision. I trained students in all tasks of the scientific process, from short field trips, collecting animals, animal care, setting up and running trials, video recordings, measuring preserved specimens of arachnids, data management, statistical analyses, and visualizing results.
- **B.S. thesis advisor**. School of Biological Sciences, Universidad Latina de Costa Rica. Student: Ariel Rodríguez. 2011.

# INVITED TALKS

- 2022. November. Invited seminar. Department of Entomology, University of Wisconsin Madison. Madison, WI, USA.
- 2022. October. Invited seminar. Department of Biology, Loyola University Chicago. Chicago, USA.
- 2022. September. Guest lecture, Course: Tropical Ecology, Department of Biological Sciences, University of Illinois Chicago. Instructor: Miquel González-Meler.
- 2022. April. Invited seminar. Department of Biological Sciences, University of Illinois Chicago. Chicago, USA.
- 2022. March. Guest lecture, Course: Behavioral Ecology, Department of Biological Sciences, University of Wisconsin Milwaukee. Instructor: Rafael L. Rodríguez.
- 2021. December. Invited seminar, Department of Biology, Davidson College. North Carolina, USA.
- 2021. March. Invited seminar, Department of Biological Sciences, University of Illinois Chicago. Chicago, USA.
- 2021. March. Guest lecture, Course: Behavioral Ecology, Department of Biological Sciences, University of Wisconsin Milwaukee. Instructor: Rafael L. Rodríguez. \*lecture was online and recorded; the video is available upon request.
- 2020. December. Invited presentation, Mhatre Lab, Department of Biology, University of Western Ontario.
- 2020. December. Invited plenary talk. VI Latino American Arachnological Congress. Virtual Conference based in Buenos Aires, Argentina. Talk video <a href="https://example.com/here">here</a>.
- 2020. October. Colloquium. Department of Biological Sciences, University of Wisconsin Milwaukee.
- 2020. July. 'Seminarios Abiertos Labre2020'. Universidad Nacional de Córdoba, Argentina. Talk video here.
- 2019. November. Tupper seminar series. Smithsonian Tropical Research Institute (STRI). Panama City, Panama.
- 2016. February. Maximizing Access to Research Careers / Undergraduate Students Training in Academic Research (MARC-U\*STAR) program. California State University (CSU) Domínguez Hill.
- 2015. October and October 2017. Essig Museum of Entomology seminar series. University of California Berkeley.
- 2012. June and May 2018. Department of Biology entomology seminar series, University of Costa Rica.
- 2012. October. Clemente Estable Biological Research Institute (IIBCE) seminar series. Montevideo, Uruguay.
- 2012. April. Costa Rican Ornithological Association. National Museum of Costa Rica.

# **CONFERENCES & SEMINARS**

- 2023. Society for Integrative & Comparative Biology (SICB) meeting. January 3 8. Austin, TX, USA. Presented one talk.
- 2022. Animal Behavior Society (ABS) in-person meeting. July 20 23. San José, Costa Rica. Presented a talk (video available upon request).
- 2021. Virtual Conference of the Animal Behavior Society (ABS). August 03 06. Attended the conferenced and co-authored a talk.
- 2021. Virtual Conference of the American Arachnological Society (AAS). June 24 July 01. Attended the conference and co-led a *Happy Hour* presenting the *Network of Emergent Latino Arachnology*, which I cofounded.
- 2021. Virtual Symposium on Biology, Conservation, Ecology, and Evolution by Costa Rican scientists abroad. 15 January. Video here.
- 2020. VI Latino American Arachnological Congress. Virtual Conference based in Buenos Aires, Argentina. 14-18 December. Co-author in one talk.

- 2020. **Symposium organizer**, ESPM department Graduate Symposium ('<u>Grad Fest 2020</u>', Berkeley, CA, USA). Spring 2020. I coordinated all the aspects of the day-long event (which occurred online given the COVID-19 pandemic), including applying for and securing funding, recruiting speakers, scheduling talks, keynote speaker participation, and workshops. I design the online platform on WordPress, including 15 pages showcasing the research of graduating Ph.D. students.
- 2020. Beyond Academia Conference. 28 February. Berkeley, CA.
- 2019. Seminar: Diversity in Graduate Education through Admissions Practices. Hosted by the California Consortium for Inclusive Doctoral Education. Berkeley, CA.
- 2019. UC Berkeley Life Sciences Symposium on Integrating Research with Education and Outreach. Berkeley, CA.
- 2018. XVII International Society for Behavioral Ecology meeting. 11 16 August. Minneapolis, Minnesota, USA. Talk.
- 2017. V Latino American Arachnological Congress. Caeté, Minas Gerais, Brazil. December 3-8,2017. Awarded **best talk** in the Behavior, Ecology, and Evolution student category.
- 2017. Animal Behavior Society Meeting. 12 -16 June. Toronto, Canada. Talk.
- 2017. Society for Integrative & Comparative Biology (SICB) meeting. 4-8 January. New Orleans, LA, USA. One poster.
- 2016. XVI International Society for Behavioral Ecology meeting. 28 July 3 August. Exeter, England. Talk.
- 2016. International Congress of Arachnology (ICA). 2-9 July. Golden, Colorado, USA. One talk and two posters.
- 2016. Society for Integrative & Comparative Biology (SICB). Meeting. 3-7 January. Portland, OR, USA. Talk.
- 2014. IV Latino American Arachnological Congress. Morelia, México. 20 25 July. One poster and one talk.
- 2014. XV International Society for Behavioral Ecology meeting. 31 July 5 August. New York City, USA. One poster.
- 2013. 50<sup>th</sup> Anniversary meeting Association of Tropical Biology and Conservation (ATBC/OTS). 23-27 June. I was the **symposium organizer** of Behavioral Ecology of Neotropical Arachnids and one talk.
- 2013. 50th Anniversary Animal Behavior Society Meeting. 28 July 1 August. Boulder, Colorado, USA. Talk.
- 2012. II Uruguayan Congress of Zoology. 9-14 December. Montevideo, Uruguay. Talk.
- 2012. III Costa Rican Ornithology Congress. 16-18 July. Two talks.
- 2011. III Latino American Arachnology Congress. Montenegro, Quindío, Colombia. 4-9 December. Two talks.
- 2010. XIV Congress of the Mesoamerican Society for Biology & Conservation. San José, Costa Rica. 11-18 November.
- 2010. II Costa Rican Ornithology Congress. 28-30 July. Co-organizer & one talk.
- 2008. II Undergraduate International Research Symposium. University of Georgia. UGA Campus San Luis, Monteverde, Costa Rica. 11-21 May. Talk.

#### INTERNATIONAL COURSES AND INTERNSHIPS

- Short graduate course: **Ecology and Evolution of Arachnids**. January 2014. Organization for Tropical Studies (OTS). La Selva Biological Station. Sarapiquí, Costa Rica.
- Short Course: **Arachnids Biology**. December, 2012. II Uruguayan Congress of Zoología. Hosted by the Uruguayan Zoological Society. Montevideo, Uruguay.
- Research internship: **Spider behavior**. September December 2012. Laboratory of Ethology, Ecology & Evolution. Clemente Estable Biological Research Institute (IIBCE). Montevideo, Uruguay. Advisors: F. Costa & A. Aisenberg.
- First Caribbean School of **Neuroethology**. May 2011. International Brain Research Organization (IBRO) & the University of La Habana. La Habana, Cuba.
- Course: **Tropical Ecology and Conservation** (OTS 09-2). January February 2009. Organization for Tropical Studies. Heredia, Puntarenas, Guanacaste & San José, Costa Rica.
- Course: Introduction to Conservation Biology in Latin America. July 2008. La Tirimbina Biological Station. Sarapiquí, Costa Rica.

# **OUTREACH: ONLINE MEDIA RESOURCES**

- 2021, August. I was interviewed (along with other researchers) for an article in **The Atlantic** on the evolution and function of legs in harvestmen. Article here.
- 2020, November. I was interviewed in an episode of the science communication podcast Fragmentos de Okazaki, produced and recorded by Nelson Saint-Hilaire & Eduardo Briceño. Episode (in Spanish) here.
- 2017, August. An **episode** about my research on the PBS-affiliated station KQED show 'Deep Look' aired. The YouTube <u>episode here</u> has over 4.5 million views. Deep Look's and UC Berkeley's College of Natural Resources <u>coverage here</u>. The episode was nominated for a Northern California Area Emmy Award in the Health/Science/Environmental-Feature/Segment category.
- 2015, August. **Science communication collaborations** produced by students in the OTS Science Communication course. (1) "Everything you knew about daddy long-legs was wrong." Kate Furby wrote an outreach piece about my research. <u>Article here</u>. (2) "Harvester of harvestmen." A podcast episode about my study was produced and recorded by Allison Fritts-Penninman & Dan DiNicola. <u>Episode here</u>.

#### **OUTREACH: SERVICE**

- 2023. January. I **served as a judge** for the Animal Behavior Society (ABS) Student and Developing Nations Research Grants. I evaluated one application from a graduate student.
- 2023. January. I served as a **mentor** for one graduate student in the Mentorship Program of the Society for Integrative and Comparative Biology (SICB).
- 2022. November. I **served as a judge** for the student travel award "María Elena Galeano for Latin American Students in Arachnology" to attend the 22nd International Congress of Arachnology in Montevideo, Uruguay, in March 2023. I evaluated 24 applications from undergraduate and graduate students.
- 2022. July. I **judged** ten student presentations at the annual meeting of the Animal Behavior Society meeting held in San José, Costa Rica.
- 2022. July. **Invited panelist**, 'Graduate School Information Session.' Hosted by J. Hamel and the Animal Behavior Society during their 2022 annual meeting in San José, Costa Rica.
- 2022. May. Presentation and live animal demonstration for middle school students and their parents, Milwaukee, WI. Event organized by the ROSE Project, Office of Science Outreach, Edgewood College, Wisconsin.
- 2022. April. I **judged** three student presentations in the 14<sup>th</sup> Annual Undergraduate Research Symposium at the University of Wisconsin Milwaukee.
- 2021. I virtually **judged** seven student presentations during the VII Simposio Colombiano de Aracnología. 10-12 November.
- 2021. October. **Invited panelist**, 'Interested in applying to graduate school in the US?' panel. Hosted by the Early Career Scientists Committee of the Association for Tropical Biology & Conservation. <u>More information is here</u>.
- 2021. August. Judge for the Founders Poster Competition during the 2021 Animal Behavior Society (ABS) Conference. I judge posters and presentations by 15 undergraduate and graduate students.
- 2021. April. Founding member of the Red de Aracnología Emergente Latina (RAEL) ('Network of Emergent Latino Arachnology'). The network is a collective of early career scientists across Latin America that aims to create community among members and provide student mentorship. More information on the website and Twitter account.
- 2020. December. Judge for the student competition in best talk/poster in Ecology and Behavior. VI Latino American Arachnological Congress. Virtual Conference based in Buenos Aires, Argentina. 14-18 December. Co-author in one talk. I judged five undergraduate and master students' project presentations on content, expression, and significance.
- 2020. May. Judge for the 34<sup>th</sup> California State University system <u>Student Research Competition</u>, hosted by CSU East Bay. I judged ten undergraduate and master students' project presentations.
- 2019. **Mentor**, <u>Científico Latino</u> Graduate School Application Initiative. I read and provided feedback on the graduate school application documents for two students.
- 2019. Judge for the 21st Annual Student Project Showcase, College of Science and Engineering, San Francisco State University (SFSU). I judged 17 undergraduate and master students' project presentations on content, expression, and significance. I was recruited through the SFSU SACNAS chapter.
- 2019. **Invited panelist**, 'How to get into graduate school' hosted by UC Berkeley's chapter of the Ecological Society of America (ESA) program Strategies for Ecology Education, Diversity, & Sustainability (<u>SEEDS</u>).

- 2019. **Reviewer for abstracts and travel awards** for the Society for the Advancement of Chicanos/Hispanics and Native Americans in Science (SACNAS) <u>2019 Conference</u>. I reviewed research abstracts for 27 undergraduate and graduate students and 14 applications for travel awards to attend the conference.
- 2019. **Invited speaker** for Cal New Experiences for Research and Diversity in Science (<u>CalNERDS</u>). I talked about my graduate school experience with first-generation students from STEM majors at UC Berkeley.
- 2019–2020. The Office of Graduate Diversity at UC Berkeley hosts the STEM-first year initiative. I served as a **mentor for first-year graduate students** from underrepresented groups in academic and professional development activities.
- 2019. Be A Scientists mentor. I **mentored and guided** a small group of 7th-grade **students** to design, conduct and present a scientific experiment. I participated as a Spanish-language mentor at Longfellow Middle School in Berkeley, California. More information about the program is here.
- 2018–2019. **Science speaker in middle school and high school** through the speaker bureau from UC Berkeley's Office of Resources for International and Area Studies (<u>ORIAS</u>). I presented an outreach talk after <u>being 'booked'</u> by teachers. Abraham Lincoln High School, San Francisco, CA, 12 Apr 2019. Aragon High School, San Mateo, CA, 18 Nov 2019. Crowden Music Center, Berkeley, CA, 25 Feb 2020.
- 2018, and 2019. **Invited panelist**, "the graduate student experience in the ESPM department at UC Berkeley." I was a panelist in a Q&A session with incoming and prospective graduate students.
- 2018. Invited graduate student, Biology Scholars Program (<u>BSP</u>) **field trip** to the UC Hastings Natural Reserve. I assisted with fieldwork exercises, biodiversity sampling, and hikes. I participated in conversations about graduate school and diversity in science with undergraduate students from UC Berkeley and UC Santa Cruz, most of them first-generation and underrepresented minority students.
- 2017, 2018, and 2019. **Invited speaker**, freshman seminar 'How to be a CNR scientist.' UC Berkeley College of Natural Resources. I served as a panelist for open Q&A sessions with students in the class, most of them first-generation and underrepresented minority students.
- 2017. <u>California Academy of Sciences NightLife</u>. Along with the Elias and Gillespie labs, I set up a **booth** displaying live and preserved arachnids to show to the general public attending this event.
- 2017. Nerd Nite East Bay. I presented an outreach research talk for a general adult audience in Oakland, California.
- 2017. <u>Las Cruces Biological Station</u> open house. I participated in this event by setting up a booth with live arachnids to show to the **community members**. San Vito, Costa Rica.
- 2015. <u>Dinner with a Scientist</u>. Hosted by the Oakland Unified School District. I talked about my research to **Elementary School students** and teachers in an informal setting.
- 2015. **Arachnid research display**. CalDay, UC Berkeley, with the Essig Museum of Entomology and Entomology Students Organizations.
- 2014. Live arthropods booth during Homecoming Weekend UC Berkeley, with the Essig Museum of Entomology and Entomology Students Organizations.

# **LANGUAGES**

Native Spanish speaker. Fluent in English. Competent in written and spoken Portuguese.

### **MEMBERSHIPS**

- Society for the Advancement of Chicanos/Hispanics and Native Americans in Science (SACNAS). Member, 2019-2022.
- Society for the Advancement of Biology Education Research (SABER). Member, 2020-2021.
- International Society for Behavioral Ecology. Member, 2014-2018, 2022-2023.
- Society for Integrative and Comparative Biology. Member. 2015-2017.
- Entomology Students Organization, UC Berkeley. Participant, 2014-2019.
- American Arachnological Society. Member, 2014-2016, 2020-2021.
- Animal Behavior Society. Member, 2013-2018, 2021-2023.

- Ornithologists Union of Costa Rica. Founder member. Partner, 2008-2011. Costar Rican Ornithological Association. Member. 2007-2009.