

# **Curriculum Vitae**

## **Fadia Sara Ceccarelli, PhD**

CICESE, Carretera Ensenada-Tijuana No. 3918, Zona Playitas  
C.P. 22860 Ensenada, B.C. México

Tel.: + 52 646 1750500 ext. 27264

Email: [ceccarelli@cicese.mx](mailto:ceccarelli@cicese.mx)

Enthusiastic, motivated, and persistent, my goal in life is to further science to serve the environment and to ensure a better planet for future generations. I believe that great changes are achieved through constant, small steps that require patience and perseverance, while always keeping the bigger picture in mind. I am passionate about nature conservation and fortunate to be in a position where my actions can contribute to achieving the goals set by myself and like-minded conservationists and nature-lovers.

### **HIGHER EDUCATION**

**PhD in Zoology** from James Cook University, Townsville, Australia. Thesis: *Dynamics of salticid-ant mimicry systems*. Supervisor: Dr. Richard Rowe. August 2006.

**Bachelor of Science with Honours in Zoology** from the University of Reading, U.K. Thesis: *Phenotypic plasticity of winged morph induction in the pea aphid *Acyrtosiphon pisum**. Supervisor: Dr. Mark Fellowes. June 2002.

### **EMPLOYMENT**

**Research Fellow** at the Conservation Biology Department of the Ensenada Center for Research and Higher Education (CICESE), working on projects related to Conservation, Ecology and Evolution of terrestrial arthropods, supervising graduate students in the Life Sciences program, teaching graduate courses (Biogeography and Introduction to Terrestrial Arthropods) and Curator of the Terrestrial Arthropod Museum of Baja California, Ensenada, Mexico. January 2017 to present.

**Postdoctoral Researcher** at the Argentine Museum of Natural Sciences “Bernardino Rivadavia” Buenos Aires, Argentina, working with Dr. Martín Ramírez on the biogeography of South American arachnids. April 2014 to March 2016.

**Environmental Consultant** for a terrestrial arthropod survey of the “Ecological Park” Pemex, Coatzacoalcos, Veracruz, México. October 2013 to November 2013.

**Research Assistant** under the Swiss program “*Biomedizin Naturwissenschaft Forschung*” in the Biogeography Institute of the University of Basel, Switzerland. Working with Dr. Simon Loader on Biogeography of African amphibians. April 2012 to June 2013.

**Postdoctoral Researcher** at the Biology Institute of the National Autonomos University of Mexico, working with Dr. Alejandro Záldivar-Riverón on the project “*Filogenias y biogeografía de avispas parasitoides Neotrópicas del género *Notiospathius* (Braconidae: Doryctinae)*”. February 2010 to February 2012.

**Environmental Consultant** for C&R Consulting, Townsville, Australia, carrying out a terrestrial arthropod survey of Lihou Reef. October 2008 to March 2009.

**Postdoctoral Researcher** at the School of Marine and Tropical Biology, James Cook University, Townsville, Australia. Working with Dr. Ross Crozier on the Evolution of immune genes in social insects. May 2006 to June 2007.

**Research Assistant** at the Phytopathology Department of the Swiss Federal Institute of Technology (ETH) Zurich. Working with Dr. Bruce MacDonald on population genetics of fungal phytopathogens. August 2002 to December 2002.

## LIST OF RELEVANT PUBLICATIONS

Listed here are publications relevant to topics of Entomology and Conservation in Baja California, Mexico. For a complete list of publications, please go to

<https://scholar.google.com/citations?user=8Gi1i3kAAAAJ&hl=es&oi=sra>

- Ceccarelli F.S., Garduño Villaseñor L.A., Hernandez Salgado L.C. (in press) Genetic diversity and population histories of two species of *Phidippus* (Araneae: Salticidae) from Northwestern Mexico. *Revista Mexicana de Biodiversidad*.
- Hernández Salgado L.C, Guerrero Fuentes D.R., Garduño Villaseñor L.A., Castañeda Betancur L., López Reyes E., Ceccarelli F.S. (2022) New Distributional Records of *Phidippus* (Araneae: Salticidae) for Baja California and Mexico: An Integrative Approach. *Diversity* 14: 159.
- Munguía-Ortega K.K., López-Reyes E., Ceccarelli F.S. (2021) Testing the accuracy of vegetation-based ecoregions for predicting the species composition of blow flies (Diptera: Calliphoridae). *Journal of Insect Science* 21: 1-6.
- Ceccarelli F.S., Aguilera-Molina V.M., Munguía-Ortega K.K., López-Reyes E. (2020) Hyperparasitism in a jeffrey pine (*Pinus jeffreyi*) defoliator in the Sierra San Pedro Mártir national park, Baja California, Mexico. *The Southwestern Naturalist* 65: 268-271.
- Aguilera-Molina V.M., Munguía-Ortega K.K., López-Reyes E., Martínez-Aquino A., Ceccarelli F.S. (2019) Climate change and forest plagues: assessing current and future impacts of diprionid sawflies on the pine forests of north-western Mexico. *PeerJ* 7:e7220 <https://doi.org/10.7717/peerj.7220>.
- Ceccarelli F.S. & Cushing P.E. (2020) Myrmecomorphy. In: Encyclopedia of Social Insects, C. Starr (ed.), Springer Nature Switzerland AG [https://doi.org/10.1007/978-3-319-90306-4\\_139-1](https://doi.org/10.1007/978-3-319-90306-4_139-1)
- Ceccarelli F.S. (2018) Batesian Mimicry. In: Encyclopedia of Animal Cognition and Behavior. J. Vonk, T.K. Shackelford (eds.). Springer International Publishing, Switzerland.
- Ceccarelli F.S. (2018) Batesian Mimicry. In: Encyclopedia of Animal Cognition and Behavior. J. Vonk, T.K. Shackelford (eds.). Springer International Publishing, Switzerland.
- López Reyes, E. y Ceccarelli, F.S. 2021. En búsqueda de los abejorros con manos, pies y computadoras. *Mediterraneus* vol 6 (22): 26-29.

## RELEVANT TALKS AND PRESENTATIONS

**Phylogeny of *Phidippus* using Ultraconserved Elements: preliminary results.**  
Luis C. Hernández Salgado\*, F. Sara Ceccarelli, Dariana R. Guerrero Fuentes, Rodrigo Monjaraz Ruedas, Marshal Hedin. Talk presented at the 2022 American Arachnological Society Summer Symposium, Davis, CA. 27-29 June 2022.

- New distributional records of *Phidippus* species for Mexico and Baja California.** Hernandez Salgado L.C.\*, Ceccarelli F.S., Garduño Villaseñor L.A., Guerrero Fuentes D.R., López Reyes E. Talk presented at the 2021 American Arachnological Society Virtual Summer Symposium, 24 June – 1 July, 2021.
- Diversity and distribution of Calliphoridae (Diptera) in five ecoregions of Baja California, México: A study of forensically important blow flies.** Munguía-Ortega K.K.\*, Ceccarelli F.S., López-Reyes E. Talk presented at the North American Forensic Entomology Association meeting, August 5th –August 7th, 2019. Purdue University Indianapolis. Indianapolis, IN, USA.
- Efecto del cambio de uso de suelo en abejas nativas (Hymenoptera: Apoidea) en los chaparrales y cultivos intensificados en la Provincia Florística Californiana del noroeste de México.** de Pedro D., Vides-Borrel E., Ceccarelli F.S., López-Reyes E., Sagot P. Talk presented at the XII virtual Congress of Mesoamerican Native Bees, 4 to 6 November 2021, UNA Costa Rica.
- Phylogeography of *Phidippus johnsoni* in the northwest region of Mexico.** Garduño-Villaseñor L.A., López-Reyes E., Ceccarelli F.S. 2020. Poster presented at the 2020 American Arachnological Society Virtual Summer Symposium 29 June 2020.
- El banquete de las arañas.** Expo at the outreach event “La Noche de las Ciencias” 8 October, 2022. Organized by CICESE, UABC and UNAM, Ensenada.
- Buscando patitas segmentadas.** Expo at the outreach event “La Noche de las Ciencias” 19 September, 2020. Organized by CICESE, UABC and UNAM, Ensenada.
- Museo de Artrópodos de Baja California.** Expo at the event “Feria de Ciencias UNIFRONT 2019”, 10 April 2019. Organized by el Colegio Unifront, Ensenada, B.C.
- Museo de Artrópodos de Baja California.** Expo at the event “Festival del Libro y la Tierra”, 28 April 2018. Organized by Proyecto Educativo Ubuntu y Estudios y Educación Integral de Ensenada, S.C., Ensenada, B.C.
- Alas, Antenas y Patas.** Expo at the event “La Noche de las Ciencias”, 8 September, 2018. Organized by CICESE, UABC and UNAM, Ensenada, B.C.
- Insectos** workshop given during the XVIII Taller de Ciencia para Jóvenes, 24 June to 2 July 2018, organized by CICESE, UNAM and UABC, Ensenada, B.C.
- Una aventura con Insectos.** Expo at the event “Semana Nacional de Ciencia y Tecnología 2017”. Organized by Vaivén de la Ciencia, CICESE, November 2017, San Antonio de las Minas, B.C.
- Alas, antenas y patas. La grandeza de los pequeños** talk given at the cycle of seminars CICESE-CEARTE (Centro Estatal de las Artes de Ensenada), Ensenada, B.C., 12 May 2021.
- El efecto del cambio climático sobre la diversidad y distribución de artrópodos terrestres de Baja California** talk given at the seminar series of GECI (Grupo de Ecología y Conservación de Islas A.C.), Ensenada, B.C., México. 18 October 2018.

## RELEVANT RESEARCH PROJECTS

- Collaborator** on the project “Evaluation of different diversity measures of bees in a Baja California desert, a biodiversity hotspot” granted by The Rufford Foundation, donation number 34755-1, 2021; PI: Diego Esperanza de Pedro; duration: 2 years.
- Collaborator** on the project “Diversity of Bees of Baja California”; International Community Foundation (Jiji Foundation) award 20200201, 2022; PI: Eulogio López; duration: 1 yr.

**PI** of the project “De micro- a macroevolución: Genética de poblaciones, diversificación y biogeografía de arañas saltarinas gigantes, *Phidippus* gen. spp. (Araneae: Salticidae)”;  
Investigación Científica Básica CONACYT grant A1-S-15134, 2019; duration: 4 years.

**Collaborator** on the project "Pollinator watch: evaluating and managing plant-pollinator ecosystem balance in Baja California" granted by The Rufford Foundation, donation number 27007-1, 2018; PI: Víctor Aguilera; duration: 2 years.

**PI** of the project “Arthropods of Baja California”; International Community Foundation (Jiji Foundation), award number 20180127, 2017; duration: 2 years.

## GRADUATE THESIS SUPERVISION

Student: **Luis Carlos Hernández Salgado**. Thesis title: *Biogeography and macroevolution of the genus Phidippus (Araneae, Salticidae) from North America*. Thesis in progress (2020-2024). Level: PhD.

Student: **Alejandra Castañeda González**. Thesis title: *Efecto de los incendios en la diversidad de abejas nativas del mediterráneo de Baja California*. Thesis in progress (2020-2024). Level: PhD.

Student: **Le Roy Anthony Sankey Alamilla**. Thesis title: *Estructura genética y filogeografía de la hormiga Myrmecocystus sp. en las dunas costeras de la península de Baja California*. Thesis in progress (2021-2023). Level: MSc.

Student: **Samuel Antonio Hernández Jiménez**. Thesis title: *Variación morfológica de las hormigas Myrmecocystus de las dunas costeras de Baja California, México*. Thesis in progress (2021-2023). Level: MSc.

Student: **Luz Abril Garduño Villaseñor**. Thesis title: *Diversidad genética y filogeografía de Phidippus (Araneae: Salticidae) en Baja California, México*. Graduated October 2022. Level: MSc.

Student: **Diego Esperanza de Pedro**. Thesis title: *Riqueza y distribución de abejas (Hymenoptera: Apoidea) en Baja California*. Graduated September 2021. Level: MSc.

Student: **Khutzy Ketzaly Munguía Ortega**. Thesis title: *Distribución, riqueza y abundancia espacio temporal de la familia Calliphoridae (Diptera) en Baja California, México*. Graduated November 2019. Level: MSc.