

# Adrian Figueroa

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Links: [Google Scholar](#) • [ORCID](#) • [ResearchGate](#) • [LinkedIn](#) • [Personal Website](#)

## Education

### **Florida International University (FIU) – Miami, FL**

Dec. 2023

Doctor of Philosophy (Ph.D.)

*Major:* Earth Systems Science (Track in Natural Resources Science and Management)

*Advisor:* Dr. Hong Liu

*Co-Advisor:* Dr. Joel T. Heinen

*GPA:* 3.75 – A

### **Florida International University – Miami, FL**

Aug. 2022

Master of Science (M.S.)

*Major:* Environmental Studies

*GPA:* 3.75 – A

### **Florida International University – Miami, FL**

Apr. 2019

#### ***Worlds Ahead Graduate\****

Bachelor of Science (B.S.) [Magna Cum Laude]

*Primary Major:* Environmental Studies (Track in Natural Resources Sciences)

*Secondary Major:* Interdisciplinary Studies

*Minor:* Biological Sciences

*Certification:* Biodiversity Conservation & Management

*GPA:* 3.75 – A

### **Miami-Dade College (MDC) – Miami, FL**

Jul. 2016

Associate of Arts (A.A.) [Summa Cum Laude]

*Major:* Engineering Science

*GPA:* 3.90 – A

## Awards and Honors (\$103,271)

- U.S. Fish and Wildlife Service Special Thanks for Achieving Results (STAR) Award (**\$2,500**) (Feb. 2025)
- Florida International University Graduate Student Publication Fund (**\$2,500**) (Nov. 2024)
- Yale University Dr. Edward A. Bouchet Graduate Honor Society Inductee (Spring 2023)
- Florida International University Graduate Student Excellence Awards Recipient (Spring 2023)
- Florida International University Dissertation Year Fellow (**\$17,181**) (Summer 2023-Fall 2023)
- Florida International University Doctoral Evidence Acquisition Fellow (**\$8,590**) (Fall 2022)
- Kelly Foundation Tropical Botany Scholarship (**\$500**) (Fall 2022)
- Florida International University Institute of Environment Graduate Student Research Grant (Summer 2022)
- Zoo Miami Gopher Tortoise Graduate Research Assistantship (Summer 2021-Spring 2022, Spring 2023)
- Directorate Fellow, International Affairs Program, U.S. Fish & Wildlife Service (**\$5,000**) (Summer 2020)
- University-Wide Charles Perry Graduate Scholarship (**\$3000**) (2020 Cycle)
- NSF FGLSAMP FIU Bridge to the Doctorate Fellow ([HRD #1810974](#); **\$64,000**) (Fall 2019-Summer 2021)
- NSF GRFP Honorable Mention (2020 Cycle)
- Society for Freshwater Sciences Instars Fellow (Summer 2019)
- FIU Worlds Ahead Graduate (Spring 2019)
- NSF GRFP Applicant x2 (2019 and 2020 Cycle)
- NSF LSAMP Grant Recipient through the Organization for Tropical Studies (**\$5,000**) (Summer 2018)
- Panther Gold & Blue Scholarship Recipient (x5) (All semesters from 2016-2019)
- Honor Transfer MDC Scholarship Recipient (x2) (Fall 2016-Spring 2017)
- Tropical Conservation Internship (TCI) Scholarship Recipient (**\$2,000**) (Spring 2017)
- Dean's List at MDC (x5) and FIU (x5) (All semesters from 2014-2019)
- American Dream Scholarship Recipient (x5) (All semesters from 2014-2016)

\*Worlds Ahead Graduates are nominated by faculty members because of their ingenuity, compassion, intelligence and courage setting them apart from their graduating class. These graduates exhibit outstanding perseverance, intelligence and personal strength during their time at FIU, and fully demonstrate and embrace what it means to be Worlds Ahead.

## **Research/Work Experience**

**U.S. Fish and Wildlife Service (Deepwater Horizon Gulf Restoration Office) – Davie, FL**

Dec. 2024 – Present

*Restoration Ecologist*

- Planning and executing ecosystem-based restoration projects that address the injuries caused by the 2010 Deepwater Horizon Oil Spill in the Gulf of Mexico.
- Restoring ecological processes, functions, and biodiversity across landscapes and seascapes, ensuring the recovery of interconnected habitats and species across the Gulf States (Texas, Louisiana, Mississippi, Alabama, and Florida).
- Operating through the authorities of the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), Oil Pollution Act (OPA), Clean Water Act (CWA), and National Environmental Policy Act (NEPA) to assess damages to natural resources, determine restoration needs, restore the injured resources, and monitor restoration success as part of the Department of the Interior's (DOI) Natural Resource Damage Assessment and Restoration (NRDAR) Program.
- Leveraging existing funding opportunities to carry out Deepwater Horizon restoration projects, thereby preserving settlement funds for use in projects where external funding opportunities did not already exist.

**University of Florida (Florida Invasion Ecology Lab) – Remote**

Dec. 2023 – Dec. 2024

*Postdoctoral Research Scientist*

- Developed a decision support tool grounded in ecological theory that prioritizes invasive species of greatest threat to the Greater Everglades' ecosystems and their restoration, in fulfillment of Section 504 of the Water Resources Development Act (WRDA) 2020.
- Compiled a congress-mandated priority list of invasive species in the Everglades with the Office of Everglades Restoration Initiatives.
- Led workshops to collaborate with invasive species experts across diverse stakeholder groups from the US Fish and Wildlife Service, US Geological Survey, National Park Service, Army Corps of Engineers, South Florida Water Management District, & Miccosukee Tribe.
- Supervised two graduate students and one undergraduate student in investigating potential impacts of Burmese pythons (*Python bivittatus*) and Argentine black and white tegus (*Salvator merianae*) on Everglades ecosystems and their restoration via seed dispersal.

**FIU (Department of Earth & Environment) – Miami, FL**

Aug. 2019 – Dec. 2023

*Doctoral Research Scientist*

- Collected fecal samples from wild gopher tortoise as part of a long-term seed dispersal ecology research project at Zoo Miami.
- Dissected gopher tortoise scat samples to identify food items and seeds dispersed as well as assess their degree of frugivory through time.
- Trained a biological research technician who has assisted in scat collection and analysis.
- Supervised three Zoo Miami REU students on gopher tortoise frugivory and seed dispersal research projects and supervised one post-baccalaureate research technician who assisted in my dissertation research.
- Processed fecal samples from wild gopher tortoises to better understand resource use ecology and seed dispersal interactions.
- Collaborated with an international team of researchers to investigate frugivory of diverse palms at the Montgomery Botanical Center.
- Analyzed foundational data from my dissertation work on resource use and seed dispersal by gopher tortoises in the pine rocklands.
- Finalized data analyses and wrote my dissertation on temporal resource tracking by gopher tortoises and implications for seed dispersal.
- Prepared to defend my dissertation in November 2023.
- Actively prepared manuscripts for publication and sought employment opportunities post-PhD.

**Zoo Miami (Conservation & Research Department) – Miami, FL**

Apr. 2021 – Apr. 2022 / Dec. 2022 – May. 2023

*Gopher Tortoise Ecology Graduate Research Assistant*

- Deployed iButton temperature data loggers for thermoregulation study of gopher tortoises living in the southernmost limit of their range.
- Processed adult gopher tortoises for reproductive phenology study to assess future climate change impacts on northern populations.
- Repaired and replaced radio transmitters for long term gopher tortoise radio telemetry/habitat use study.
- Performed wellness checks on at-risk gopher tortoises near human-frequented areas and perimeter moat surrounding Zoo Miami.
- Compiled a comprehensive pine rockland seed reference guide for use in an animal-mediated seed dispersal study.
- Collected fecal samples from wild gopher tortoise as part of a long-term seed dispersal ecology research project.
- Supervised three undergraduate student researchers in research centered on the seed dispersal ecology of gopher tortoises by studying color preference and gut retention times in captive individuals.
- Relocated waif gopher tortoises in line with applicable Florida state law as part of a research project on translocation success.
- Performed Line Transect Distance Surveys to obtain robust estimates of gopher tortoise population densities in Miami, FL.
- Teamed with gopher tortoise researchers in Palm Beach, Broward, and Miami-Dade to submit a publication on the status of gopher tortoises at the southeastern extent of the species' range.
- Published a research paper on the conservation policy and management landscape of the globally imperiled pine rockland ecosystem, as well as made suggestions to improve revenue generation, goal setting, and management activities.

**U.S. Fish and Wildlife Service (International Affairs: Division of International Conservation) – Remote**

Jun. 2020 – Aug. 2020

*Directorate Fellow*

- Conducted an analysis of past federal funding history for over 4,500 international conservation projects worldwide, totaling over \$181 million dollars.
- Assigned conservation area names to 1,446 awards to better track and understand the geographic distribution of federal funds for species conservation.
- Communicated findings on the quantity, legacy, and consistency of federal funding to stakeholders within the U.S. Fish and Wildlife Service, as well as self-reported results on the impact federal funds had on conservation activities and outcomes abroad.
- Accounted for the use of over \$181 million federal dollars for international species conservation programs.
- Identified successful conservation outcomes in the funding history of international conservation projects, contributing to the Service's understanding of the effectiveness of international species conservation programs.

**South Florida Water Management District (Vegetation Management Division) – West Palm Beach, FL**

Jun. 2019 – Aug. 2019

*Botanist Intern*

- Completed transects of District-owned properties in search for invasive plant species and when feasible, manually removing said plants.
- Collected and identified specimens of native, exotic, and invasive plant species.
- Pressed and mounted plant specimens collected from the field and added them to the herbarium.

- Updated, organized, and revitalized the South Florida Water Management District's herbarium of 1200 specimens.
- Created an electronic database of the South Florida Water Management District's updated herbarium collection.

**FIU Tropics (Tropical Conservation Internship Program) – Miami, Florida**

Sep. 2018 – May. 2019

*Undergraduate Research Intern Peer Mentor*

- Received, reviewed, and revised project reports from interns.
- Implemented survey on minority students' experiences in green-STEM / environmental biology.
- Supervised research interns in the completion of their research projects and providing direction when needed.
- Advised research interns about potential career and graduate research opportunities.
- Created the Tropical Conservation Internship's blog website for subsequent research intern cohorts.

**Organization for Tropical Studies (Research Experience for Undergraduates Program) – Heredia, Costa Rica**

Jun. 2018 – Aug. 2018

*Conservation Ecology Research Intern*

- Developed a scientific research project regarding collared peccary vigilance behavior.
- Deployed motion-sensing cameras in 48 sites to record footage of wildlife in the vicinity.
- Marked and mapped GPS coordinates of survey sites where motion-sensing cameras were deployed.
- Discerned statistical information from the data collected to create models and figures.
- Crafted a scientific manuscript for submission at the end of the program and for peer-review publication.

**City of Miami Beach (Environment & Sustainability Department) – Miami Beach, FL**

Jan. 2018 – Apr. 2018

*Environmental Resources Intern*

- Compiled data collected from environmental monitoring devices throughout the city.
- Published first-ever "State of the Environment" report for the city's Environment & Sustainability Department.
- Shadowed an Environmental Specialist and Environmental Inspector during field surveys and environmental impact assessments.
- Attended Sustainability and Resiliency Committee hearings regarding environmental conservation and management efforts.
- Recommended solutions to environmentally hazardous situations that required immediate attention.

**Zoo Miami (Conservation & Research Department) – Miami, FL**

Oct. 2016 – Apr. 2021

*Gopher Tortoise Ecology Research Intern/Scientist*

- Collected habitat/burrow characteristics data from gopher tortoises living in the pine rockland ecosystem at Zoo Miami and Deering Estate.
- Utilized radio telemetry equipment to track gopher tortoises in the study.
- Conducted research on the dietary composition and seed dispersal potential of gopher tortoises living in the zoo's pine rocklands.
- Extracted seeds from gopher tortoise scats and germinated them in the FIU Organic Garden shade house.
- Restored pine rockland habitat by transplanting threatened and endangered native plants.
- Constructed bat houses throughout zoo property for the federally endangered Florida Bonneted Bat (*Eumops floridanus*).

## Publications

- **Figueroa, A.**, K.R. Davis, M.E.A. Harman, I.A. Bartoszek, I.C. Easterling, A.A. Yackel Adams, C.M. Romagosa. in review. Double Agents: Invasive Burmese Pythons (*Python bivittatus*) and Black and White Tegus (*Salvator merianae*) as Potential Seed Dispersers in South Florida. *Journal of Zoology*.
- **Figueroa, A.**, J. Vizenin-Bugoni, A. Herrera, L. Cuni, J. Villate, H. Liu, and S. Whitfield. in review. Seasonality and Morphological Variation Drive Intraspecific Seed Dispersal Networks in Gopher Tortoises. *Oikos*.
- **Figueroa, A.**, P. Chernyavskiy, M. Greenacre, A. Herrera, L. Cuni, J. Villate, M. Galetti, H. Liu, and S. Whitfield. 2024. Precipitation Drives Frugivory in a Subtropical Generalist Herbivore, the Gopher Tortoise, and Alters Its Functional Role as a Seed Disperser. *Ecology and Evolution* 14:e70585.
- **Figueroa, A.**, K. Coblentz, A. Herrera, L. Cuni, J. Villate, H. Liu, M. S. Araujo, and S. M. Whitfield. 2024. Seasonal frugivory drives both diet inconsistency and individual specialization in the generalist herbivore gopher tortoise. *Food Webs* 40:e00356.
- Whitfield, S. M., J. P. Scholl, E. M. Frazier, K. Hendrickson, **A. Figueroa**, L. Gapeczynski, R. Schneider, O. Rothberg, J. Ghenassia, and J. A. Moore. 2024. Status, Distribution, and Management of Gopher Tortoises in Highly Urbanized Southeastern Florida. *Southeastern Naturalist* 23.
- Koi, S., **A. Figueroa**, and H. Liu. 2024. Citizen science engagement reveals patterns of long-term persistence of an at risk butterfly in three metropolitan centers. *Journal for Nature Conservation* 81:126689.
- **Figueroa, A.**, J. T. Heinen, F. N. Ridgley, S. M. Whitfield, and H. Liu. 2023. Management of a Globally Imperiled and Fire-Dependent Ecosystem in the Urban Matrix of Miami-Dade County, Florida: A Case Study of the Richmond Tract Pine Rocklands. *Diversity* 15:426.
- Whitfield, S. M., D. Valle, **A. Figueroa**, B. Chin, H. Bravo-Gallegos, and F. Leone. 2022. Burrow Characteristics and Habitat Associations of Gopher Tortoises in Urban Pine Rockland Reserves (Miami, Florida, USA). *Ichthyology & Herpetology* 110:22–32.
- **Figueroa, A.**, J. Lange, and S. M. Whitfield. 2021. Seed Consumption by Gopher Tortoises (*Gopherus polyphemus*) in the Globally Imperiled Pine Rockland Ecosystem of Southern Florida, USA. *Chelonian Conservation and Biology* 20:27–34, 8.

## Journal Reviews

- *US Geological Survey/Hydrobiologia* (1; 2024)
- *Discover Conservation* (1; 2024)
- *Scientific Reports* (1; 2024)
- *Global Ecology and Conservation* (1; 2024)
- *Food Webs* (1; 2023)

- *Herpetological and Conservation Biology* (1; 2022)
- *Southeastern Naturalist* (1; 2019)

## **Society Memberships**

- *American Fisheries Society*
- *American Society of Mammalogists*
- *Everglades Invasive Species Management Area*
- *Gopher Tortoise Council*
- *Pine Rockland Working Group*
- *Society for Freshwater Science*
- *Society of Wetland Scientists*
- *The Wildlife Society*

## **Academic Presentations**

### **8th European Conference of Tropical Ecology (ECTE) – Amsterdam, Netherlands**

Feb. 2025

*Collaborated on a project that was presented at ECTE.*

- A project of which I am a major collaborator on with Dr. Márcio Silva Araújo of the Universidade Estadual Paulista, titled “Drivers of intraspecific niche variation in the South American darter *Characidium schubarti* (Crenuchidae)”, was presented. This research project, which explores how environmental and morphological factors influence the incidence of diet specialization in a South American freshwater fish, was given. This study provides major ecological and evolutionary insights into how individuals partition resources under dynamic environmental conditions with varying levels of intra- and interspecific competition, informing conservation and management efforts.

### **Working Group/Science Coordination Group – Invited Talk – West Palm Beach, FL**

Oct. 2024

*Invited to summarize my postdoctoral research project to members of the South Florida Ecosystem Restoration Task Force.*

- Gave a 15-minute presentation to Everglades biologists, natural resource managers, and policy experts representing academic, federal, state, and non-governmental organizations, regarding my postdoctoral project’s progression. This presentation covered the state of the decision support tool I developed and the final steps in ensuring a smooth handoff of the final deliverable, whose results will be presented at the upcoming South Florida Ecosystem Restoration Task Force meeting in Washington DC.

### **Working Group/Science Coordination Group – Invited Talk – Davie, FL**

Jul. 2024

*Invited to give updates on my postdoctoral research project to members of the South Florida Ecosystem Restoration Task Force.*

- Gave a 15-minute presentation to a panel of Everglades biologists, natural resource managers, and policy experts representing academic, federal, state, and non-governmental organizations, regarding my postdoctoral project. This presentation covered the development of the decision support tool I worked on and crucial steps I had taken to ensure its functionality and validity while inviting collaboration.

### **2024 Everglades Invasive Species Summit:**

#### **Hosted by the Everglades Cooperative Invasive Species Management Area (ECISMA) – Invited Talk – Davie, FL**

Jun. 2024

*Invited to present my postdoctoral project on a decision support tool I created that systematically prioritizes invasive species of greatest importance.*

- Presented a 15-minute talk to an audience of > 75 Everglades biologists and invasive species experts representing academic, federal, state, and non-governmental organizations, regarding my postdoctoral project which is an R Shiny decision support tool that systematically prioritizes invasive species of greatest risk and potential impact to the Greater Everglades Ecosystem.

### **Dissertation Defense – Miami, FL**

Nov. 2023

*Defended my dissertation on individual specialization, frugivory, and seed dispersal by gopher tortoises in the imperiled pine rockland ecosystem.*

- Presented my doctoral research to my PhD committee and over 50 audience members attending both in person and online. My dissertation focused on quantifying how seasonal shifts in precipitation facilitate individual diet specialization in the gopher tortoise via increased frugivory. As precipitation increases, fleshy fruits increasingly become available and gopher tortoise individuals increasingly consume them, allowing for individual specialization and broadening the functional role of this species as a seed disperser in the pine rocklands.

### **Gopher Tortoise Council Conference – Research Talk – Freeport, FL**

Nov. 2022

*Gave a presentation on frugivory by gopher tortoises and how this foraging strategy in the species varies through time.*

- Gave a 15-minute talk to a cross-state organization focused on the conservation and management of gopher tortoises across their range. My talk focused on the temporal shift in gopher tortoise foraging strategy from herbivory through frugivory in response to fruiting phenology.

### **Pine Rockland Working Group Conference – Miami, FL**

Nov. 2022

*Presented key findings on frugivory by gopher tortoises to practitioners and researchers in pine rockland ecology and conservation.*

- Delivered a 15-minute talk to an international cohort of practitioners and researchers in pine rockland ecology and conservation, regarding shifts toward frugivory by gopher tortoises in the southeastern-most extent of their range, in the pine rocklands of Miami-Dade County, FL.

### **Zoo Miami – Miami-Dade County Gopher Tortoise Planning Meeting – Miami, FL**

Dec. 2021

*Spoke to stakeholders from across Miami-Dade County government about my research on seed dispersal by gopher tortoises.*

- Gave a presentation to stakeholders from Miami-Dade County's Natural Areas Management (NAM), Parks, Recreation, and Open Spaces (PROS), and Environmentally Endangered Lands (EEL) Program about the role gopher tortoises may serve as seed dispersal vectors in the pine rockland ecosystem under their ownership and management. I also explained the direction of my research for my dissertation and opened a discussion on how my research may guide better management of gopher tortoises, threatened plants, and their imperiled habitat.

**Florida International University – Behavioral Ecology Class Guest Lecture – Miami, FL**

Nov. 2021

*Gave a guest lecture at an undergraduate Behavioral Ecology course at Florida International University.*

- Delivered a full length 45-minute guest lecture at an undergraduate Behavioral Ecology Course and discussed seed dispersal ecology, defaunation, the importance of behavior in seed dispersal, and how to appropriately design research methodology for scientific studies.

**Gopher Tortoise Council Conference – Research Talk – Virtual**

Oct. 2021

*Presented my undergraduate research on the role of gopher tortoises as seed dispersal vectors, while providing new findings.*

- Gave a 15-minute research talk at the annual Gopher Tortoise Council Conference. I discussed major findings from my published undergraduate research and updated the attendees on new findings and future directions of my work.

**Zoo Miami REU Program – Research Talk – Miami, FL**

Aug. 2021

*Presented my research project on seed consumption by gopher tortoises in the Richmond Tract pine rocklands, along with new findings.*

- While serving as a co-mentor during the Zoo Miami REU program, I was invited to give a research presentation on my study involving seed consumption by gopher tortoises. My presentation, along with those of other mentors were used as a template for undergraduates to follow.

**International Affairs Program @ U.S. Fish & Wildlife Service – Directorate Fellow Program Presentation– Remote**

Aug. 2020

*Presented my work as a summer-long Directorate Fellow within the Division of International Conservation.*

- Explained the project I completed as a fellow with the Service which focused on analyzing the past funding history of international species conservation programs supported by the federal government as well as self-reported estimates of impact from project partners.

**Florida International University – Department of Earth & Environment Seminar – Miami, FL**

Dec. 2019

*Presented the theme of my dissertation research in a three-minute lightning talk.*

- Gave a lightning talk on my proposed dissertation research to other graduate students, faculty, and the general public.

**Hyatt Regency on Capitol Hill – American Society of Mammalogists Conference – Washington, D.C.**

Jun. 2019

*Poster presentation at the 100<sup>th</sup> annual American Society of Mammalogists 2019 Conference*

- Described research I conducted at La Selva Biological Station regarding the Landscape of Fear and Human Shield Hypotheses which I tested with collared peccaries (*Pecari tajacu*) at along a spatial gradient from human-occupied landscapes.

**Salt Palace Convention Center – Society of Freshwater Science Conference – Salt Lake City, UT**

May. 2019

*Poster presentation at the 66<sup>th</sup> annual Society of Freshwater Science 2019 Conference*

- Elucidated the various factors identified by survey respondents at FIU as enabling and/or hindering in the attainment of Environmental-STEM opportunities.

**Fairchild Tropical Botanical Garden – Tropical Botany and Pine Rockland Conference – Miami, FL**

Nov. 2018

*Poster presentation at the 20<sup>th</sup> annual Tropical Botany and Pine Rockland Conference (2018)*

- Detailed the nature of my research on seed ingestion by gopher tortoises (*Gopherus polyphemus*) in the highly fragmented and endangered Richmond tract pine rocklands and the significance of my study in conserving/managing this rare ecosystem.

**Gopher Tortoise Council Conference – Poster Presentation – Venus, FL**

Oct. 2018

*Poster presentation at the 40<sup>th</sup> annual Gopher Tortoise Council Conference (2018)*

- Explained the scope of my research project regarding seed consumption and potential dispersal by gopher tortoises in the endangered pine rocklands of South Florida.

**La Selva Biological Station – Organization for Tropical Studies (OTS) – Heredia, CR**

Aug. 2018

*Research presentation at the La Selva OTS Research Experience for Undergraduates Summer 2018 Research Symposium*

- Gave a talk on my research project regarding changes in collared peccary (*Pecari tajacu*) vigilance behavior at La Selva through the analysis of spatial and temporal factors such as proximity to human-dominated landscape, forest cover, and presence/absence of predators.

**The Kampong National Tropical Botanical Garden – Tropical Conservation Internship Symposium – Miami, FL**

Apr. 2017

*Research presentation at the inaugural FIU Tropical Conservation Internship (Spring 2017) Research Symposium*

- Presented my research on the seed composition of gopher tortoise diets in the globally imperiled pine rockland habitat of Florida.

**Service-Type Presentations**

**Tropical Audubon Society – Tropical Audubon Ambassador Program 2024 Invited Panelist – Virtual**

Oct. 2024

*Spoke about the persistent threat of invasive species for ecosystem restoration in South Florida and the importance of science and policy.*

- I was invited to serve as a panelist and discuss the impacts of invasive species on the pine rockland ecosystem and the Everglades. I spoke about the work being done to prevent/eradicate invasive species and the impact they have on our native flora/fauna, as well as how my experience as a researcher requires both scientific research and policy experience to protect and restore South Florida's ecosystems.

- Fairchild Tropical Botanic Garden – Connect to Protect Network Invited Seminar Talk – Virtual** Oct. 2022  
*Shared research findings on seed dispersal of locustberry in the pine rockland ecosystem by gopher tortoises and its importance in their diet.*
- I was invited to give a seminar talk on my dissertation research regarding the diet and seed dispersal ecology of gopher tortoises to a group of citizen gardeners who are members of Fairchild’s Connect to Protect Network Program. The theme of the presentation was seed dispersal of locustberry by gopher tortoises (*Gopherus polyphemus*) and Florida box turtles (*Terrapene carolina bauri*).
- Everglades National Park South Florida Natural Resources Center – Research Talk – Miami, FL** Oct. 2021  
*Presented research findings on seed consumption in the pine rockland ecosystem by gopher tortoises, along with new findings.*
- I was invited to give a research presentation on my project regarding seed consumption by gopher tortoises in the pine rocklands to Everglades National Park staff and other stakeholders in South Florida natural resource management.
- BioTECH High School @ Richmond Heights – Guest Lecture in Seed Dispersal Ecology – Miami, FL** Feb. 2020  
*Served as a guest lecturer for two courses in research and experimental design at Miami-Dade County’s conservation biology magnet school.*
- Taught two classes of high school students from Miami-Dade County’s conservation biology magnet school, BioTech @ Richmond Heights, on evolution, natural selection, and adaptive radiation, and explained how those concepts apply to seed dispersal ecology.
- Florida International University – Global Environments and Society Course – Miami, FL** Aug. 2019  
*Guest interviewee for a Global Environments and Society course at Florida International University*
- Interviewed by an FIU professor from the Earth & Environment Department for an online class in Global Environments and Society course to speak about my research interests and my journey from undergraduate to my first semester of graduate school.
- WLRN Sundial – “I’ve Graduated. Now What?” – Miami, FL** May. 2019  
*Student panelist for Miami affiliate of the National Public Radio, WLRN, to discuss life after college*
- Discussed on live radio and Facebook Live, the many (personal/financial) challenges that undergraduate students experience in South Florida as well as what my plans were for after graduating with my bachelor’s degree.
- Florida International University - Introduction to Earth and Environment Freshman Seminar – Miami, FL** Apr. 2019  
*Guest lecturer for a freshman introductory course for the Earth & Environment Department at Florida International University*
- Informed students about various internship opportunities I was part of, how I found/acquired those opportunities, and tips for successful attainment of these environmental STEM learning/working experiences.
- Florida International University – Tropical Ecology Course – Miami, FL** Mar. 2019  
*Panelist for a Tropical Ecology course at Florida International University*
- Served as a panelist for an undergraduate course in Tropical Ecology, where all panelists spoke of research they have conducted in tropical ecology and how it relates to their current research interests/activities.
- Fairchild Tropical Botanic Garden – City Nature 2018 – Coral Gables, FL** Apr. 2018  
*Education and Outreach volunteer for FIU BioDiscover Day at Fairchild Tropical Botanic Garden*
- Helped my professor (Dr. Hong Liu) set up a plant-animal interaction display table where I interpreted the materials being presented to a diverse audience. From preschool-aged children to senior citizens, I conveyed information on mutualisms and ecology.
- A.D. Barnes Park – Florida Native Plant Day – Coral Gables, FL** Mar. 2018  
*Education and Outreach volunteer for Florida Native Plant Day at A.D. Barnes Park*
- Set up an interactive native plant display where I engaged with an audience of various ages and backgrounds on the importance of native plants and their pollinators.
- The Kampong National Tropical Botanical Garden – Tropical Conservation Internship Symposium – Miami, FL** Nov. 2018  
*Plenary speaker at the 6<sup>th</sup> installation of the FIU Tropical Conservation Internship (Fall 2018) Research Symposium*
- Communicated my perspective as a first-generation Cuban-American student in environmental-STEM and the various obstacles I had to overcome to become aware of and attain experiences in a variety of environmental research/stewardship opportunities.
- Professional Development**
- University of Maryland at College Park – Ronald E. McNair 2023 Conference – College Park, MD** Mar. 2023  
*Recruited promising undergraduate students to Florida International University’s Graduate School.*
- Invited to recruit graduate students during the 2023 Ronald E. McNair Conference at the University of Maryland in College Park. I informed and educated students on graduate school opportunities and fellowships that exist at Florida International University.
- Fairchild Tropical Botanical Garden – Fairchild Challenge: A Seed’s Journey Judge – Miami, FL** Nov. 2021  
*Served as a judge for the Fairchild Challenge: A Seed’s Journey Competition.*
- Was invited to serve as a judge on a panel for the Fairchild Challenge titled “A Seed’s Journey.” This competition is between children from grades K-12 who create art and other crafts to illustrate botanical and ecological phenomenon. In this case, it was seed dispersal.
- Society of Wetland Scientists – QGIS Online Workshop – Remote** May. 2020  
*Held a workshop on the proper use of QGIS for environmental/conservation research.*
- Trained graduate and undergraduate students on how to use QGIS for conservation research by working through interactive exercises where students familiarized themselves with how to import shapefiles, create a map legend, and implement other GIS tools.
- Florida International University – Restoration Ecology Lab Course – Miami, FL** Feb. 2020

*Trained undergraduate students on the proper use of handheld GPS units for fieldwork and research.*

- Assisted a PhD student/lab instructor in training her undergraduate students how to properly utilize handheld GPS units for marking waypoints, tracking one's own movements, field navigation, and other applications for ecological research.

**Fairchild Tropical Botanic Garden – Endangered Everglades Plant Fieldwork – Miami, FL**

Dec. 2019 & Jan. 2020

*Conducted fieldwork at Everglades National Park with team of Fairchild and FIU researchers.*

- Surveyed a wide region of buttonwood hammock in the southwestern portion of Everglades National Park for the endangered plant, *Chromolaena frustrata*. These expeditions were intended for assessing the impacts of hurricanes on the plant population's survival.

**Florida International University – ComSciCon Miami 2019 – Miami, FL**

Oct. 2019

*Participant in the first-ever ComSciCon (Communicating Science Conference) in Miami.*

- Learned how to communicate my research effectively to a diverse audience using a combination of various media outlets, platforms, and strategies depending on the demographic I am speaking with. I was one of 30 participants selected to attend.

**Long Key Natural Area & Nature Center – Everglades Comprehensive Invasive – Davie, FL  
Species Management Area Summit**

Jul. 2019

*Invasive Plant Management Working Group and Invasive Plant Taxonomy Workshop at the 15<sup>th</sup> annual Everglades Comprehensive Invasive Species Management Area Summit 2019 Conference*

- Networked with a variety of governmental, university, and private stakeholders regarding invasive species management efforts throughout the entirety of the Everglades watershed.

## **Journal Clubs**

- International Center for Tropical Botany
- Tropical Biology/Ecology

## **Skills**

- Conservation policy.
- Protected areas management.
- Radio telemetry.
- Line transect distance survey techniques.
- Camera trapping.
- GPS data entry with handheld GPS device.
- Mapmaking in ArcGIS and QGIS.
- Statistical analyses via R and SPSS statistical software.
- Coding/Programming in R, R Shiny, SQL, Stan, JavaScript, CSS, HTML.
- Confident public speaker with great communication skills.
- Exceptional writing skills.
- Fluent in English and Spanish.
- Proficient in Microsoft Word, PowerPoint, Excel, Outlook, Windows MovieMaker, and Adobe Photoshop.

## **Certifications**

- Federal Acquisition Certification for Contracting Officer's Representatives (FAC-COR) Level I
- National Wildfire Coordinating Group L-180, Human Factors in the Wildland Fire Service
- National Wildfire Coordinating Group S-130, Firefighter Training
- National Wildfire Coordinating Group S-190, Introduction to Wildland Fire Behavior
- Biodiversity Conservation & Management Academic Certification
- FL Boating Safety Course Certification (ID: D9G58GJ8L897JI5)
- Tropical Conservation Internship Certificate of Completion
- Institute for Civic Engagement and Democracy (ICED) Social Entrepreneurship Certification