

ANASTASIA C. E. QUINTANA

Nicholas School of the Environment
Duke University Marine Lab
135 Duke Marine Lab Rd, Beaufort NC 28516

anastasia.quintana@duke.edu
+1.760.846.4445
anastasiaquintana.com

EDUCATION

- 2020 **Duke University**, Durham, NC
PhD, Marine Science and Conservation, May 2020
Dissertation: “A spark for collective action: Challenges and opportunities for self-governance in temporary fisher-designed Fish Refuges in Mexico”
Committee: Dr. Xavier Basurto (chair, Duke University), Dr. Lisa Campbell (Duke University), Dr. Grant Murray (Duke University), and Dr. Noella Gray (University of Guelph)
- 2014 **University of California Santa Barbara**, College of Creative Studies, Santa Barbara, CA
BA, *summa cum laude*, Biology (focus in Marine Ecology), June 2014
Dean’s Honors 2010-4, Honors Program 2010-4

PROFESSIONAL APPOINTMENTS

- 2020-22 **NSF Postdoctoral Research Fellow**, University of California Santa Barbara, Santa Barbara, CA
National Science Foundation, Directorate for Social, Behavioral, and Economic Sciences

AREAS OF PROFESSIONAL EXPERTISE

Common pool resource theory
Collective action and resource dilemmas
Social-ecological systems and resilience theory
Conservation and development in the Global South
Mixed social science methods
Fisheries anthropology
Small-scale fisheries
Political ecology

PUBLICATIONS

- 2020 **Quintana, A.C.E.** and Basurto, X. “Community-based conservation strategies to end open access: The case of Fish Refuges in Mexico” Accepted, *Conservation Science and Practice*.
- 2020 **Quintana, A.C.E.**, Basurto, X., Rodriguez-Van Dyck, S., and Weaver, A. H. “Political making of more-than-fishers through their involvement in ecological monitoring of protected areas” Accepted, *Biodiversity and Conservation*.
- 2019 **Quintana, A.**, & Campbell, L. M. (2019). Critical Commons Scholarship: A Typology. *International Journal of the Commons*, 13(2), pp. 1112–1127. DOI: <https://doi.org/10.5334/ijc.925>
- 2017 Garcia-Vedrenne, A.E., **Quintana, A.C.E.**, DeRogatis, A.M., Dover, C.M., Lopez, M., Kuris, A.M. and Hechinger, R.F., 2017. “Trematodes with a reproductive division of labour: heterophyids also have a soldier caste and early infections reveal how colonies become structured.” *International journal for parasitology*, 47(1), pp.41-50.

- 2016 Garcia-Vedrenne, A.E., **Quintana, A.C.E.**, DeRogatis, A.M., Martyn, K., Kuris, A.M. and Hechinger, R.F., 2016. “Social Organization in Parasitic Flatworms—Four Additional Echinostomoid Trematodes Have a Soldier Caste and One Does Not”. *Journal of Parasitology*, 102(1), pp.11-20.

In revision

Quintana, A.C.E. Marcos, S., Malpica-Cruz, L., Tamayo, L., Canto Noh, J.A., Fernandez, F., and Fulton, F. “Social dilemmas of managing to collapse invasive species fisheries: Lessons from lionfish in Mexico.” Under revision, *Reviews in Fish Biology and Fisheries*.

Malpica-Cruz, L., Fulton, S., **Quintana, A.C.E.**, Zepeda-Domínguez, J.A., Quiroga, B., Tamayo, L., Canto Noh, J.A., Côté, I.M. “Collapsing a fishery for conservation: successful invasive species control by artisanal fishers”. Under revision, *Reviews in Fish Biology and Fisheries*.

In advanced preparation

Quintana, A.C.E., and Murray, G. “‘Ping-pong hybridization’ navigates barriers to local ecological knowledge (LEK) integration in fisheries co-management: lessons from Mexico”. In prep for *Human Ecology*. Available upon request.

Quintana, A.C.E. Gray, N., Campbell, L., Murray, G., and Basurto, X. “A boundary object policy with three conflicting interpretations facilitates cooperation for marine conservation in Mexico”. In prep for *Marine Policy*. Available upon request.

Giron-Nava, J.A., **Quintana, A.C.E.**, Urmey, S., and Cramer, A. “A dangerous game: Social-ecological feedback loops in temporary MPAs designed by fishers” In prep for and accepted to special issue of *Frontiers in Marine Science*.

Elsler, L., Giron-Nava, J.A., **Quintana, A.C.E.**, and Stefanski, S. “Local cooperative functionality protects fisheries from international market pressure”. In prep for *PNAS*.

PRESENTATIONS AND POSTERS AT SCIENTIFIC CONFERENCES

- 2019 **Quintana, A.C.E.** and X. Basurto. 2019. “Unbundling and trading property rights in a fishing commons.” In Defense of the Commons, XVII Biennial International Association for the Study of the Commons (IASC) Conference, July 1-5, 2019, Lima, Peru. *Oral presentation*.
- 2019 **Quintana, A.C.E.** 2019. “Are unclear goals better for environmental policy?” Annual GradX Talks, April 1, 2019, Durham, NC. *Oral presentation*.
- 2019 **Quintana, A.C.E.** and Basurto, X. 2018. “Legal but not legitimate: The paradox of knowledge in Mexican fisheries co-management.” North Carolina Conference on Latin American Studies. February 22-24, 2019, Chapel Hill, NC. *Oral presentation*.
- 2018 **Quintana, A.C.E.** Gray, N., Campbell, L., and Basurto, X. 2018. “Weakly defined MPAs make space for small-scale fishers to pursue own interests.” 3rd World Small-Scale Fisheries Congress. October 22-26, 2018, Chiang Mai, Thailand. *Oral presentation*.
- 2017 **Quintana, A.C.E.**, A.H. Weaver, S. Rodriguez, and X. Basurto. 2017. “Local ecological knowledge, participation, and legitimacy: Effects of an ecological monitoring program in a Mexican small-scale fishery.” Practicing the Commons, XVI Biennial International Association for the Study of the Commons (IASC) Conference, July 10-14, 2017, Utrecht, the Netherlands. *Oral presentation*.

- 2017 **Quintana, A.C.E.**, A.H. Weaver, S. Rodriguez, and X. Basurto. 2017. "Buzos Monitores are not environmental subjects: Results from a community-based ecological monitoring project for fishers in Baja California, Mexico." Centre for Maritime Research (MARE) Conference IX People and the Sea, July 5-7, 2017, Amsterdam, the Netherlands. *Oral presentation.*
- 2017 **Quintana, A.C.E.** 2017. "Storytelling and science." North Carolina Marine and Coastal Science Symposium (NC MarCo), March 31, 2017, Beaufort, NC. *Oral presentation.*
- 2015 **Quintana, A.C.E.** 2015. "Why parasites are fascinating and not horrifying." Annual GradX Talks, March 24, 2015, Durham, NC. *Oral presentation.*
- 2014 Garcia-Vedrenne, A.E., **Quintana, A.C.E.**, Kuris, A.M., Hechinger, R.F. 2014. "Reproductive division of labor in the Trematoda: A systematic evaluation of sociality in the community of trematodes that infect the California horn snail, *Cerithidea californica*." American Society of Parasitology Annual Meeting 2014, July 24-27, 2014, New Orleans, LA. *Poster.*
- 2013 **Quintana, A.C.E.**, Garcia-Vedrenne, A.E., Hechinger, R.F., Kuris, A.M. 2013. "Trematodes of the California horn snail: some have social organization with reproductive division of labor, others do not." Western Society of Naturalists, November 7-10, 2013, Oxnard, CA. *Oral presentation.*

COMPETITIVE FELLOWSHIPS AND SCHOLARSHIPS

- 2020-22 Postdoctoral Research Fellowship, National Science Foundation Directorate for Social, Behavioral and Economic Sciences (NSF SPRF), \$143,000, 2020-2022
- 2019-20 Anne Firor Scott Public Scholars Fellowship, \$23,850, Forum for Scholars and Publics, 2019-2020
- 2019 Bass Instructional Fellowship, \$11,925, Anne T. and Robert M. Bass Endowment Fund for the Bass Undergraduate Instructional Program, fall 2019
- 2017-9 Graduate Student Pursuit Fellowship, \$3,000, National Socio-Environmental Synthesis Center (SESYNC), 2017-2019
- 2017-8 James B. Duke International Research Travel Fellowship, \$26,912, Duke University Graduate School, 2017-2018
- 2017 Summer Research Fellowship Award, \$5,500, Duke University Graduate School, summer 2017
- 2013 Stansbury Fellowship, \$5,000, University of California at Santa Barbara, 2013
- 2010-4 Regents Scholarship, \$24,000, University of California, 2010-2014

RESEARCH EXPERIENCE

Duke University, Durham, NC

- 2015-7 **Field Research Assistant**, NSF CNH Award #1632648 (Baja California Sur, Mexico: social science survey design and application, semi-structured interviews, qualitative coding and analysis)
- 2014 **Field Research Assistant** (Baja California, Mexico: field site viability assessment, interviews, translation)

University of California at Santa Barbara, Santa Barbara, CA

- 2013-4 **Student Research Assistant** (parasite dissections, slide prep, microscope photography)
- 2013 **Stansbury Research Fellow** (research design, parasite dissections, slide prep, microscope photography, statistical data analysis)
- 2011-2 **Student Intern** (urchin dissections, sample preparation)

INTERNATIONAL FIELDWORK EXPERIENCE

Costa Rica (Guanacaste), Spain (Catalunya), Turks and Caicos (South Caicos), Mexico (Baja California, Baja California Sur, Sonora, Quintana Roo)

TEACHING EXPERIENCE

Sole Instructor of Record, Duke University

Masters courses

2019 Theory and Methods for Policy Analysis of the Commons (3 semester units), Fall 2019

Teaching Assistant, Duke University

Masters courses

2016 Marine Climate Change (3 semester units), Spring 2016.

2014 Marine Policy (3 semester units), Fall 2014

Undergraduate courses

2017 Community-Based Conservation in the Gulf of California (international field course, 3 semester units), Spring 2017

2015 Biological Oceanography (4 semester units), Fall 2015

Student mentoring

2018-9 **Bass Connections project, “Ocean Evidence Gap Map”** with Duke University and World Wildlife Fund. Duke Marine Lab: Beaufort, NC. Fall 2018-Spring 2019.

Role: Train, mentor, and manage team of 4 undergraduate and Masters students to conduct systematic literature review using Colandr software.

Formal training in teaching

2014-20 **Certificate in College Teaching Program**, Duke University: Durham, NC, Fall 2014-Spring 2019
Duke program in college teaching; includes formal classes, teaching experience, and peer evaluations

2019 **Teaching Triangles Co-Lecturer**, 7 hours of instruction, Deep-Sea Science and Environmental Management, Duke Marine Lab, Spring 2019

2019 **College Teaching and Course Design** (2 unit course), Duke University: Beaufort, NC. 2019

2017 **Gender and Sexual Diversity Training**, Duke Women’s Center, Beaufort, NC, January 19, 2017

2016 **Facilitating Student Learning** (2 unit course), Duke University: Durham, NC. Fall 2016

2015 **Research Educator Exchange Forum (REEF) 2015**: Center for Ocean Sciences Education Excellence (COSEE), North Carolina State University, Raleigh, NC, January 23-24, 2015

INTERDISCIPLINARY SOCIAL-ECOLOGICAL COLLABORATIONS

2018-9 **Graduate Team Member, “Ocean Evidence Gap Map”**, Bass Connections Project, Duke Marine Lab and World Wildlife Fund (WWF): Duke Marine Lab, Beaufort, NC

2018 **Fellow, Eco-DAS 2018** (Ecological Dissertations in the Aquatic Sciences), Competitive biennial interdisciplinary workshop, October 15-20, 2018, University of Hawai’i, Manoa, Honolulu, HI

- 2017-9 **Graduate Pursuit Fellow, SESYNC** (National Socio-Environmental Synthesis Center), Annapolis, MD. “Cross-scale exploitation patterns and marine population collapse in international seafood markets”
- 2016-8 **Research Assistant, NSF CNH Project** (National Science Foundation Dynamics of Coupled Natural-Human Systems Program), Award #1632648, “Resilience and Adaptive Capacity of Small-Scale Fishing Communities and Coastal Marine Ecosystems to Environmental and Economic Variability” (\$1,790,687)
- Roles: Research assistant (summer 2016, summer 2017, fall 2017), workshop participant (November 2016, August 2018)

SERVICE

Peer Reviewer

Fish and Fisheries, Ecology and Society, International Journal of the Commons, Journal of Society & Natural Resources, Journal of Institutional Economics, Regional Environmental Change, Journal of Ethnobiology, Conservation Letters, Ambio

Professional

- 2020-21 **Conference organizer**, IASC Virtual Fisheries Conference (March 9-11, 2021, online)
- 2020 **Reviewer**, Foundation for Food and Agriculture Research, Seeding Solutions grant program (foundation of USDA)
- 2018-9 **Duke Marine Lab Graduate Student Representative**, Duke Marine Lab: Beaufort, NC
- 2016-7 **Van Dover Inclusive Graduate Education Travel Award coordinator**, Duke Marine Lab: Beaufort, NC.
- 2015-7 **Duke Marine Lab Seminar Series Organizer**, Duke Marine Lab: Beaufort, NC
- 2013-4 **UC EAP “Global Ambassador”**, University of CA Education Abroad Program: Santa Barbara, CA
- 2012-3 **Aquarist**, Research Experience and Education Facility (REEF), UCSB: Santa Barbara, CA

Community

- 2015-9 **Co-founder**, Girls Exploring Science and Technology (GEST), Duke Marine Lab, Beaufort, NC: November 2015 – ongoing (annual one-day event)
- 2017 **Volunteer English teacher**, Puerto de Agua Verde, BCS, Mexico: Oct 2017 - Dec 2017
- 2016-7 **Organizing Committee: Logistics, Donations, and Advertising Coordinator**, SciREN (The Scientific Research and Educator Network), North Carolina Aquarium at Pine Knoll Shores, Pine Knoll Shores, NC, Nov 2016 – Feb 2017
- 2015 **Project and Event Manager**, Community Food Lab, Raleigh, NC, January – May 2015
- 2015 **Judge**, Blue Heron Bowl (National Ocean Sciences Bowl), UNC-CH, Chapel Hill, NC, 7 Feb 2015.
- 2014-5 **Mentor**, Women and Math (WAM) Mentoring Program, Durham, NC, October 2014-May 2015

PROFESSIONAL MEMBERSHIPS

- 2019-20 AAAS/Science (sponsored member through Program for Excellence in Science)
- 2016-20 International Association for the Study of the Commons (IASC)
 Founding member of IASC Early Career Network (2020)
- 2014-5 American Society of Parasitologists

ADDITIONAL SKILLS

Software: Tableau, NetLogo, Colandr, NVivo, Qualtrics, JMP, WordPress, Bookwright, Adobe Illustrator, Beautiful[AI]

Languages: Spanish (fluent), French (conversational)