

Mayra A. Román Rivera

PhD

Knoxville, TN

mromanri@utk.edu

AREAS OF INTEREST

Coastal Geomorphology, Coastal Management, Remote Sensing and GIS Applications of Coastal Environments, Community Outreach (i.e. citizen science projects, science education)

APPOINTMENTS

Lecturer	University of Tennessee, Department of Geography, August 2021-
Research Assistant	University of South Carolina, Department of Geography, April 2020-August 2020 Carolinas Integrated Science and Assessments
Adjunct Faculty	University of South Carolina, Department of Geography, 2019-2020

EDUCATION

Ph.D.	University of South Carolina (Geography, 2019)
M.A.	East Carolina University (Geography, 2014)
B.A.	University of Puerto Rico, Río Piedras Campus (Geography and Anthropology, 2012)

PUBLICATIONS

Peer-Reviewed

- Ellis, J.T., **Román-Rivera, M.A.**, Harris, M., and Tereszkievicz, P. (2020). *Two Years and Two Hurricanes Later: Did the Dunes Recover?* Shore and Beach, 88(4).
- Román-Rivera, M.A.**, Ellis, J.T., and Wang, C., (2020). *Applying a Rule-Based OBIA Approach for Nearshore Bar Identification*. Journal of Remote Sensing, 14(4): doi: 10.1117/1.JRS.14.044502
- Ellis, J.T., Harris, M., **Román-Rivera, M.A.**, Ferguson, J.B., Tereszkievicz, P. and McGill, S. (2020) *Application of the Saffir-Simpson Hurricane Wind Scale for Estimating Sand Dune Response to Tropical Storms*. Special Issue Journal of Marine Science and Engineering, 8 (9): <https://doi.org/10.3390/jmse8090670>.
- Ellis, J.T., and **Román-Rivera, M.A.** (2019). *Assessing Natural and Mechanical Dune Performance in a Post-Hurricane Environment*. Special Issue Journal of Marine Science and Engineering, 7 (126): doi:10.3390/jmse7050126.

Román-Rivera, M.A., and Ellis, J.T. (2019). *A Synthetic Review of Remote Sensing Applications to Detect Nearshore Bars*. *Marine Geology*, 408: pp. 144-153.

Román-Rivera, M.A., and Ellis, J.T. (2018). *LETTERS TO THE EDITOR: The King Tide Conundrum*. *Journal of Coastal Research*. 34 (4): pp. 769-771.

Other

Román-Rivera, M.A. (2018) *Review of Spatial Analysis of Coastal Environments by Sarah Hamylton*. *AAG Review of Books*, 6(4).

Román-Rivera, M.A., and Ellis, J.T. (2018). *Dunes: The Coasts' First Line of Defense*. *Southeastern Geographer*. 58 (2): pp. 141-142.

RESEARCH EXPERIENCE

2016-2020 Hurricane Recovery at Isle of Palms, SC
 Research Co-Lead

2015 Woods Hole Oceanographic Institute Research Experience
 Guest Student

2012-2014 Blowout Dynamics at Cape Cod, MA
 Research Assistant

2013 Stream Channel Adjustments in a North Carolina Watershed
 GIS Analyst

2010-2012 Beach Monitoring Project
 Field Assistant

2009-2012 Citizen Scientist Volunteer
 Field Assistant

TEACHING EXPERIENCE

University of Tennessee

Lecturer

Geography 131: Weather, Climate, and Climate Change

Geography 331: Natural Hazards

University of South Carolina

Instructor of Record

Geography 104: Introduction to Physical Geography

Geography 105: The Digital Earth

Geography 363: Introduction to Geographic Information Systems

Graduate Teaching Assistant

Geography 201: Landform Geography

Marine Science/Geology 215: Coastal Environments of the Southeastern U.S.

CERTIFICATIONS

2021	Certified Interpretive Guide, National Association for Interpretation
2020	Online Teaching Certificate, Center for Teaching Excellence, University of South Carolina
2018	Preparing Future Faculty, Center for Teaching Excellence, University of South Carolina
2014	Geographic Information Science and Technology Certificate, The Graduate School of East Carolina University

INVITED TALKS

Coastal Management Practices Gone Wrong at University of Tennessee-Knoxville – Department of Geography Colloquium Series: October 28, 2021.

PRESENTATIONS

(First author is presenting author; Included presentations from the last 5 years)

Ferguson, J., Ellis, J., Harris, M., **Román-Rivera, M.**, and Tereszkievicz, P. *Geomorphic Response of the Beach-Dune System to the 2017 and 2018 Hurricane Seasons at the Isle of Palms, SC*. Annual Meeting of the American Shore and Beach Preservation Association, Session 1C: Coastal Response to Storms. Myrtle Beach, SC. (October 2019)

Román-Rivera, M. and Ellis, J.T. *Using Multispectral Imagery to Detect Nearshore Bars and Elucidate Beach-Dune System Dynamics*. Paper presentation at the American Association of Geographers Annual Meeting, Washington D.C. (April 2019)

Román-Rivera, M. and Ellis, J.T. *The King Tide Conundrum*. Paper presentation at the American Association of Geographers Annual Meeting, New Orleans, LA. (April 2018)

McGill, S., Ellis, J.T., and **Román-Rivera, M.** *Investigating Post-Hurricane Damage Mitigation Techniques on Dune System Recovery*. Paper presentation at the American Association of Geographers Annual Meeting, New Orleans, LA. (April 2018)

McGill, S., Ellis, J.T., and **Román-Rivera, M.** *Comparing Dune Recovery Management Techniques Post-Hurricane*. Poster presentation at the Southeastern Division of the American Association of Geographers, Starkville, MS. (November 2017)

Román-Rivera, M., and Ellis, J.T. *Beach-dune Recovery Along the South Carolina Coast Post Hurricane Matthew*. Paper presentation at the American Association of Geographers Annual Meeting, Boston, MA. (April 2017)

FELLOWSHIPS AND AWARDS

- 2018 Southern Regional Education Board Dissertation Award Recipient
2018 American Association of Geographers Dissertation Research Grant
2016-2017 Department of Geography Graduate Instructor Award Recipient, University of South Carolina
2016-2017 Department of Geography Bennett S. Masaschi Field Experience Graduate Award Recipient, University of South Carolina
2012 Magna Cum Laude, University of Puerto Rico, Río Piedras Campus
2011-2012 Scholars in Residence: Initiative of Undergraduate Research and Creative Activity, University of Puerto Rico, Río Piedras Campus

PROFESSIONAL AFFILIATIONS

- 2019-present American Association of Hispanics in Higher Education
2015-present American Shore and Beach Preservation Association
2014-present Gamma Theta Upsilon International Geographic Honor Society
2013-present Geographic Society of Puerto Rico
2013-present Southeastern Division of the American Association of Geographers
2010-present American Association of Geographers

PROFESSIONAL SERVICE

Disciplinary Service

- U.S. Coastal Research Program Human & Ecosystem Health Workshop Summary Reviewer (October 2021)
Conference session organizer for the Coastal and Marine Specialty Group of the American Association of Geographers (October 2018-April 2020)
Spanish translation reviewer for portions of the National Climate Assessment (NCA4) (October 2018)
Member of Organizing Committee of the Caribbean Specialty Group of the American Association of Geographers (April 2018-April 2019)
Doctoral Student Board Member, Coastal and Marine Specialty Group of the American Association of Geographers (April 2015-April 2016)

Manuscript Reviewer (in alphabetical order)

- Climate Risk Management* (2016-)
Geomorphology (2021-)
Journal of Coastal Research (2017-)
Journal of Marine Science and Engineering (2021-)
ISPRS International Journal of Geo-Information (2021-)

Remote Sensing (2020-)

External Service

- 2018 Community service-learning project: Ballooning for the Scientific Method, White Knoll Elementary, Lexington South Carolina
- 2017 Outreach activity during the Total Solar Eclipse, Indian Waters Council Boy Scouts of America, Camp Barstow Columbia, South Carolina
- 2009-2011 Volunteer research assistant, Para La Naturaleza, Conservation Trust of Puerto Rico