Laura Stearns

Center for Texas Beaches and Shores · Texas A&M University at Galveston (972) 746-1998 • L.STEARNS12@TAMU.EDU

EDUCATION

MS, Marine Resource Management

Texas A&M Galveston Campus

Masters Professional Project: "Assessing the Impact of Storm Surge and Sea Level Rise on Industrial Structures in the Port of Houston" Chair: Dr. Sam Brody

BS, Ocean and Coastal Resources, cum laude

Texas A&M Galveston Campus

Undergraduate Thesis: "The 21st Energy Transition of Individual Countries" Advisor: Dr. Glenn Jones

RESEARCH INTERESTS

Geostatistical analytics; Coastal and Urban Flood Risk; Urban Resilience; Natural Hazards

EXPERIENCE

Research Associate

Texas A&M Galveston Campus | Center for Texas Beaches and Shores

- Manage PostGIS database for large spatial datasets used across the team ٠
- Collaborate to create maps that better represent flood risk for various audiences •
- Process and perform statistical analysis of geospatial data
- Format technical documents using Adobe Creative Cloud products

National Science Foundation Research Fellow

National Science Foundation Partnerships for International Research and Education

- Traveled to the Netherlands to meet with flood risk reduction experts
- Participated in flood risk reduction design workshop with Dutch students •
- Completed a case study comparing urban flood risk in Amsterdam to that in Houston

Research Assistant

Texas A&M Galveston Campus | Center for Texas Beaches and Shores

- Assisted in data collection and writing for the Commission to Rebuild Texas Hurricane Harvey report
- Developed risk scores for Houston and Galveston area for Buyers Be-Where website •
- Continued maintenance of online Texas Coastal Atlas

Student Technician

Texas A&M Galveston Campus | Center for Texas Beaches and Shores

- Created a library of data for Texas Coastal Atals
- Formatted data layers using ArcGIS

October 2018 - Present

Fall 2017- Summer 2018

Fall 2016- August 2018

Fall 2012- Spring 2016

January 2018 - August 2018

Spring 2017-Summer 2017

Updated Texas Coastal Atlas using ArcGIS Online ٠

Teaching Assistant

Texas A&M University Galveston Campus

- Taught two sections of Engineering Physics and one section of Wetland Management
- For Physics Sections: Planned lectures and instructed labs, graded weekly assignments and exams
- For Wetland Management: Helped organize lessons and coordinated plans with Army Corps representative; assisted in wetland delineations

Teaching Assistant

Texas A&M University Galveston Campus

- Taught two sections of College Physics and one section of Engineering Physics ٠
- Led laboratories explaining basic concepts of mechanical physics ٠
- Planned lectures and instructed labs, graded weekly assignments and exams

TECHNICAL SKILLS

- Computing: R, ArcGIS, QGIS, PostgreSQL/PostGIS, Python, Stata •
- Design: Adobe InDesign, Adobe Illustrator •

PRESENTATIONS

- Buyers BeWhere Interactive Portal, **March 2018** (Poster Presentation) Texas A&M Discovery Lounge, South by Southwest Conference
- "Assessing the Impact of Storm Surge and Sea Level Rise on the Petrochemical Industry along the Houston Ship Channel", February 2018 (Poster Presentation) SSPEED Conference, Rice University
- "Hurricane Harvey and Buyers Be-Where", November 2017 (Oral Presentation) Buyers Be-Where Workshop, United Way of Greater Houston
- "The 21st Century Energy Transition of Individual Countries", April 2016 (Poster Presentation) 12th Annual Research Symposium, TAMUG

AWARDS AND HONORS

Undergraduate Research Scholar

Awarded at graduation upon completing the Undergraduate Research Scholar Thesis Program

3rd Place in Topics on Ocean and Coastal Resources April 2016

Awarded at TAMUG 12th Annual Research Symposium in the Marine Sciences and Ocean and Coastal Resources category

Spring 2017

Fall 2016

May 2016