Connor Brubaker

College Station, TX

☐ (737) 217 - 3632 • ☑ brubaker@tamu.edu • in connorbrubaker • ☐ brubakerconnor

Summary

Ph.D. candidate in statistics with expertise in time series analysis, spatial statistics, and machine learning and strong proficiency in R and Python. Thrives in interdisciplinary collaborative environments aimed at solving complex problems and seeks a role in designing well-crafted statistical solutions for automation and discovery.

Education

Texas A&M University

College Station, Texas

Ph.D. in Statistics

The University of Texas at Austin

Austin, Texas

B.S. in Mathematics

2019

2025

Experience

Liberty Mutual Insurance

Boston, MA

Data Science Intern Jun. 2022 - Aug. 2022

- O Restructured and performed morphological and syntactic analysis on large, annotated text corpora using R and Python.
- O Designed and validated hierarchical machine learning models based on transformers for automatic underwriting risk segmentation.

Applied Research Laboratories

Austin, TX

Engineering Research Associate

Dec. 2019 - Jul. 2020

- O Implemented deep learning models for online object-tracking in sonar images using transfer learning.
- O Developed and trained convolutional neural network-based models for dimensionality reduction and clustering of image data.
- O Authored educational materials for an internal course on machine learning.

Alerian

Dallas, TX

Data Intern

May 2019 - Aug. 2019

- O Developed automated reporting and backtesting processes in Visual Basic, enhancing accuracy and significantly reducing time costs.
- O Applied time series forecasting and causal inference to evaluate the impact of marketing budget changes on website traffic and sales.

Publications

Connor Brubaker and Scott Bruce. Time-varying frequency band analysis for multiple nonstationary time series. In Preparation, 2025.

Connor Brubaker, Jack Manning, Jennifer Yentes, and Scott Bruce. Frequency band analysis for multiple stationary time series. In Preparation, 2024.

Dakota Doucet, Connor Brubaker, Donald Turner, and Carl A Gregory. Factors affecting the role of canonical wnt inhibitor dickkopf-1 in cancer progression. Frontiers in Oncology, 13:1114822, 2023.

Collaborative Projects

Survey Analysis of K-12 Teacher Sentiment Towards AI in Education

Collaboration with the Department of Geology & Geophysics at Texas A&M

2024

Automatic Storm Track Identification via Spatiotemporal Regionalization of Weather Data

Collaboration with the Department of Atmospheric, Oceanic & Earth Sciences at George Mason University

2024

Quasi-Poisson Regression Analysis of Fly Production Data

Collaboration with the Department of Entomology at Texas A&M

2024

Cluster Analysis of EOG Measurements for the Detection of Fatigue

Collaboration with the Department of Industrial & Systems Engineering at Texas A&M

2024

Analysis of Home Range and Ecological Needs of the Western Chicken Turtle

Collaboration with the Natural Resources Institute at Texas A&M

2023

Meta-Analysis on the Link between Tissue Origin and Role of Dkk-1 in Cancer Progression

Collaboration with the College of Medicine at Texas A&M

2022

2022

Teaching

- O Instructor for STAT 211, Principles of Statistics I. Spring 2022.
- O Instructor for STAT 302, Statistical Methods. Fall 2021.
- O TA for STAT 673, Time Series Analysis I. Fall 2024.
- O TA for STAT 652. Statistics in Research II. Summer 2021.
- O TA for STAT 611, Theory of Statistical Inference. Spring 2021.
- OTA for STAT 608, Regression Analysis. Fall 2020.

Presentations

Joint Statistical Meetings 2024	Portland, OR
Contributed Talk	August 2024
Joint Statistical Meetings 2023	Toronto, ON, CA
Contributed Talk	August 2023
SRCOS Summer Research Conference	Waco, TX
Poster	June 2023
SETCASA Poster Competition	College Station, TX
Poster	May 2023

Awards & Recognition

SRCOS Summer Research Conference	Waco, TX
Travel Award	2023
SETCASA Poster Competition	College Station, TX
Silver Award	2023
Texas A&M University	College Station, TX

Service

ASA DataFest at Southern Methodist University Guest Lecturer	Dallas, TX April 2024
Department of Statistics Data Science Summer Camp	College Station, TX
Volunteer Instructor	June 2023

Professional Organizations

- O American Statistical Association
- O International Chinese Statistical Association
- American Guild of Organists

Skills

Software: R, Python, TensorFlow, PyTorch, C++, SQL, Shell, Git, Docker, AWS

Nominated for College of Science Award for Outstanding Achievement in Graduate Teaching

Statistical: Time series analysis, regression analysis, spatial statistics, machine learning, natural language processing, cluster analysis, Bayesian methodology, statistical modeling, computer vision