

## Education

---

### Ph.D. Statistics

2019 – present

Colorado State University

Dissertation: *Statistical inference on reproducibility in high-throughput experiments.*

Advisor: Wen Zhou

GPA: 3.927

### B.S. Statistics; B.A. Mathematics

2015 – 2019

Winona State University

GPA: 4.0

## Professional Experience

---

### Colorado State University

2019 – present

Fort Collins, CO

- Graduate Teaching Assistant
- Graduate Research Assistant

SU2020, SU2021, SU2022

### Winona State University

2018 – 2019

Winona, MN

- TRIO One-on-One Statistics Tutor

### National Science Foundation Research Experience for Undergraduates

SU2018

Fort Collins, CO

- Undergraduate Statistical Consultant

## Teaching Experience

---

### Colorado State University

Instructor

Introduction to Applied Statistics (STAT301)

F2020, S2021, F2021, S2022, F2022, S2023

Statistics Supplement (STAT302A)

F2023, S2024

Interim Emergency Instructor

Statistics Supplement (STAT302A)

F2022, S2023

(Stepped in midway through the semester.)

Undergraduate Mentor

Statistical Research - Design, Data, Methods (STAT472)

F2022

Assistant Course Coordinator

Introduction to Applied Statistics (STAT301)

S2023, F2023, S2024

Course Developer

Statistics Supplement (STAT302A)

SU2023

Intermediate Applied Statistical Methods (STAT331)

SU2023

Grader

Intro to Theory and Practice of Statistics (STAT315)	F2019
Introduction to Applied Statistics (STAT301)	S2020
Data Analysis and Regression (STAT540)	F2021
Statistical Consulting Skills (STAT555)	S2022

#### Recitation Instructor

General Statistics (STAT201)	F2019, S2020
------------------------------	--------------

#### Short Course Instructor/Facilitator

Coding & Cookies: Reproducible Reports Using RMarkdown, Colorado State University	F2022, F2023
Coding & Cookies: Data Visualization Using ggplot2, Colorado State University	S2023

### Research Interests

---

Multiple testing procedures.

Replicability/Reproducibility and its application in high-throughput experimentation.

Statistical applications in sports.

### Publications

---

Evans RC, **Ellingworth A**, Cashen CJ, Weinberger CR, Sambur JB. Influence of single-nanoparticle electrochromic dynamics on the durability and speed of smart windows. *Proc Natl Acad Sci USA*. 2019 Jun 25; 116(26): 12666-12671.

### Presentations

---

“Reproducible or not: a data adaptive nonparametric procedure to define and assess reproducibility across high-throughput studies,” EcoSTA, Tokyo, JP (Virtual). 8/2023. (Invited Presentation)

“Reproducible or not: a data adaptive nonparametric procedure to define and assess reproducibility across high-throughput studies,” WNAR, Anchorage, AK. 6/2023. (Invited Presentation)

“A data adaptive rank-based procedure for assessing reproducibility of highthroughput experiments,” WNAR, Virtual, 6/2022. (Student Paper Oral Presentation)

“Constrained Spline Estimation of the Particle-Particle Interaction in Nanostructured Tungsten Oxide,” Research Experiences for Undergraduates Symposium, Alexandria, VA. 10/2018. (Poster Presentation)

### Awards

---

<b>Distinguished Service Award</b>	Colorado State University Department of Statistics	2023
<b>Outstanding Graduate in Statistics</b>	Winona State University	2019
<b>Best Overall Team</b>	MinneMUDAC Data Analytics Competition	2017

### Review Service

---

<b>Journal Referee</b>	Electronic Journal of Statistics
------------------------	----------------------------------

### Departmental and University Service

---

<b>Student Representative</b>	Winona State University Dean’s Advisory Council	2017-2019
<b>Vice President</b>	Winona State University Statistics Club	2018-2019

### *Professional Development*

---

<b>Member</b>	Colorado State University Statistics Teaching/Pedagogy Working Group	<i>2022-present</i>
---------------	--	---------------------

### *Technical skills*

---

<b>Software and Languages</b>	R, $\text{\LaTeX}$ , Excel, JMP, MATLAB, and Tableau
-------------------------------	--