RYAN J. ERICKSON

github.com/Ryan-Erickson911 ◇ linkedin.com/in/ryan-ericksons-profile

Seattle, WA, 98144 ◇ ryanerickson407@gmail.com

EDUCATION

University of Colorado, Boulder — Aug. 2021 - Dec. 2025
Geography, MA

University of California, Santa Barbara — Sep. 2017 - May 2020
Geography - GIS Emphasis, BA
Physics, BA

WORK EXPERIENCE

Spatiotemporal Pattern Analysis and Research Laboratory — Aug. 2021 - Oct. 2025
Research Assistant — *Dr. Guofeng Cao*

· Deployed a 250m resolution surface ozone Python CLI for urban areas.

· Authored a 150+ page thesis depicting five ML/AI models trained via EPA and satellite.

· Advised laboratory research associates on data science, IT services, and workflow optimization methods.

North Central Climate Adaptation Science Center — May 2025 - Aug. 2025
Research Assistant — *Dr. Heather Yocum, Dr. Matthew Rossi*

· Presented a thermodynamic framework for revisiting the existence of a topographic signature of life.

· Composed a blog highlighting available technology and future directions.

· Gathered, maintained, and distributed satellite data to present avenues of action.

Institute of Behavioral Science — Jan. 2022 - Dec. 2024
Research Assistant — *Dr. Stefan Leyk, Dr. Colleen Reid*

· Translated data aggregation methods from Python to R which enhanced interdisciplinary collaboration.

· Developed a random forest model for surface O_3 exposures with respect to EPA monitors.

· Assigned air pollution exposures for CO and NO_2 with EPA monitor measurements.

Geography Department - University of Colorado, Boulder — Aug. 2021 - Aug. 2023
Teaching Assistant — *Various*

· Scheduled 30+ office hours a week for 250+ students to promote student development and interaction.

· Restructured course material under supervision to update old ESRI programs with modern case studies.

SKILLS

Software
Atom, Docker, Eclipse, ESRI Suite, GitHub, Google Cloud Platform, MS Suite, QGIS, Visual Studio

Syntax
Dart, Flutter, Java, HTML, JavaScript, LaTeX, Python, R, SQL, XML/GML

Geographic Information Science
Atmospheric chemistry, meteorology, hydrology, spatial-temporal analysis, remote sensing and UAS

Computer Science
Data science, ML/AI engineer, workflow optimization, information technology, database management

CERTIFICATIONS

UAS Remote Pilot (Part-107) — May 2024 - May 2026
SCUBA Certification — Aug. 2017