

Lewis Drakeley

No Sponsorship Required

Personal Website 
www.linkedin.com/in/lewis-drakeley 

ljdrakeley@gmail.com
(585) 481-9303

Education

University of Rochester

Aug, 2019 – May, 2023

Physics and Astronomy, Mathematics (BA)

GPA: 3.59

Dean's Scholar, Dean's List, Sigma Pi Sigma Honors Society

Relevant Coursework: *Data Collections and Algorithms, Linear Algebra, Financial Mathematics, Thermodynamics & Statistical Mechanics*

Languages and Programs: *Python, Java, SQL, R, Tableau, HTML, CSS, JavaScript*

Experience

Research Assistant

May, 2022 – May, 2023

University of Rochester

Rochester, NY

- Analyzed $\sim 10^4$ galactic observations from the Dark Energy Spectroscopic Instrument to visualize dark matter abundance.
- Developed and managed rigorous quality control protocols to successfully identify and eliminate 92% of misleading data.
- Performed bash scripting in Linux based terminals to analyze 500+ galactic spectra to quantify data integrity.
- Created visualization algorithms to observe the rotational velocity of 350+ galaxies.
- Ensured consistent version control through GitHub to facilitate a seamless on-boarding process for new research assistants.

Observational Astronomy

Jan, 2022 – May, 2022

University of Rochester

Rochester, NY

- Remotely observed galactic formations and hydrogen regions with control of the C.E.K Mees Observatory.
- Performed image processing through signal-to-noise masking and calibrating for foreground extinction to eliminate all false signals and effects of interstellar dust particles.
- Interpreted filtered images to present colorized interstellar formations to an audience of 100+.

Training Team Leader

Aug, 2021 – May, 2023

Goergen Athletic Center

Rochester, NY

- Restructured the training procedure and introduced online components to extend accessibility to resources.
- Facilitate improvement opportunities for all building managers, ensuring high performance standards across staff of 40+.

Resident Advisor

Aug, 2021 – May, 2023

University of Rochester

Rochester, NY

- Performed rotating on-call shifts to attend any emergencies of the 800+ residents and resolve any student concerns.
- Offered personal support, address misconduct, and facilitate conflict resolution for 75 residents.

Skills and Certifications

Google Data Analytics course

May, 2023 – July, 2023

- Performed join techniques through SQL to evaluate multiple store performances across various holidays.
- Designed Tableau data visualization dashboards to highlight fluctuating store profits over multiple years.

Fluent in Welsh, English and intermediate in ASL

Projects

Personal Static Website

June, 2023 – August, 2023

- Utilized expertise in HTML, CSS, and JavaScript to create, construct, and publish a static website hosted on GitHub.
- Created a responsive design to maximize screen-size for all devices.

Drone Pilot Game (Java)

Aug, 2022 – Dec, 2022

University of Rochester

Rochester, NY

- Created a Java GUI drone simulation with a simple user-interface to provide seamless gameplay for all users.
- Designed with intuitive features such as lives, depreciating fuel consumption and drone skins for a personalized experience.