William W. Meynardie

University of Michigan
Department of Astronomy
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EDUCATION

Ph.D. in Astronomy and Astrophysics — August 2023 - May 2028 (expected)
University of Michigan, Ann Arbor, MI

Bachelor of Science in Astronomy-Physics — August 2018 - May 2022
Graduated with highest distinction
University of Virginia, Charlottesville, VA
Total GPA: 3.873/4.000
Major GPA: 3.899/4.000

PROFESSIONAL EXPERIENCE

Graduate Student Mentor — August 2025 - Present
University of Michigan

- ➢ Currently serving as the Graduate Student Mentor in the University of Michigan's Astronomy Department.
- ➢ Duties include checking in on the Graduate Student Instructors, mediating conflict between instructors (student or faculty), and helping the student instructors navigate unexpected challenges as they arise.

Graduate Student Instructor — January 2024 - December 2024
University of Michigan

- ➢ Taught lab sessions for ASTRO 102: *Introductory Astronomy: Stars, Galaxies, and the Universe* for two semesters.
- ➢ Duties included 3-4 hours of classroom instruction per week, as well as office hours, grading weekly assignments, and assisting students through email.

Postbac Research Technician — August 2022 - July 2023
California Institute of Technology

- ➢ Duties included identifying and classifying transient events, reporting saved and classified transients to the Transient Name Server (TNS), and operating the DBSP spectrograph on numerous nights for observing runs.
- ➢ Research involved working on a project to analyze SN2021uvy, a supernova with an extremely long double-peaked light curve and [O III] emission lines at late times. This resulted in a co-authorship on a paper.

Telescope Operator/Teaching Assistant — September 2021 - May 2022
McCormick Observatory at the University of Virginia

- ➢ Duties included operating the McCormick 26-inch Refractor Telescope and pointing out objects of interest in the night sky to students.

Research Assistant — May 2021 - August 2021
National Radio Astronomy Observatory

- ➢ Attended the National Radio Astronomy Observatory's REU program and worked on a project analyzing the IR-Radio Correlation in substructures of

Luminous Infrared Galaxies.

RESEARCH PROJECTS

Ross 458 C: Gas Giant or Brown Dwarf? November 2023 - May 2025
University of Michigan
Mentored by Prof. Michael Meyer

- ➢ Reduced a JWST spectrum of the widely separated planetary-mass object Ross 458 C.
- ➢ Wrote code to convolve and interpolate grids of models to fit the data.
- ➢ Interpreted the results of the forward model analysis and a separate retrieval analysis to constrain the formation history of Ross 458 C.
- ➢ Published our results in the Astrophysical Journal.

Morphological Classification of LIRGs in GOALS August 2021 - May 2022
University of Virginia
Mentored by Dr. Aaron Evans and Dr. Sean Linden

- ➢ Wrote code to classify galaxies based on their Gini coefficient and M_{20} value using optical and near-IR archival HST images.
- ➢ Sorted the sample by various parameters and identified trends in the data.
- ➢ Wrote and submitted a senior thesis at the end of the school year.

Probing Resolved Structures in LIRGs August 2020 - August 2021
University of Virginia, National Radio Astronomy Observatory (REU)
Mentored by Dr. Aaron Evans and Dr. Sean Linden

- ➢ Convolved 1.49 GHz VLA and 24, 70, and 100 µm infrared images of nearby LIRGs to a common resolution of 6.0″.
- ➢ Performed photometry on structures, comparing 1.49 GHz luminosity to total infrared luminosity.
- ➢ Wrote a report and gave a presentation on the results.

REFEREED PUBLICATIONS

Meynardie, W., Meyer, M., MacDonald, R., et al., 2025.
Ross 458 C: Gas Giant or Brown Dwarf, ApJ, 994, 237.

Sharma, Y., Sollerman, J., **Meynardie, W.**, et al., 2025.
Twin Peaks: SN 2021uvy and SN 2022hgk in the Landscape of Double-peaked Stripped Envelope Supernovae, PASP, 137, 094101.

Das, K., Kasliwal, M., et al. (including **Meynardie, W.**), 2025.
Low-luminosity Type IIP Supernovae from the Zwicky Transient Facility Census of the Local Universe. I. Luminosity Function, Volumetric Rate, PASP, 137, 044203.

Goobar A., Johansson, J., et al. (including **Meynardie, W.**), 2023.
SN Zwicky: uncovering a population of gravitational lens galaxies with magnified 'standard candles', Nature Astronomy, 7, 1098–1107.

Song, Y., Linden, S. T., et al. (including **Meynardie, W.**), 2022.
Characterizing Compact 15-33 GHz Radio Continuum Sources in Local U/LIRGs, ApJ, 940, 52.

TALKS

Ross 458 C: Gas Giant or Brown Dwarf?
Great Lakes Exoplanet Area Meeting 2025
Madison, WI, November 2025.

Probing Resolved Structures in LIRGs
NRAO Summer Symposium
Green Bank, WV, July 2021.

POSTERS

Ross 458 C: Gas Giant or Brown Dwarf?
Atmospheric Characterization of Rocky to Giant Exoplanets in Thermal Emission with JWST
Aspen, CO, March 2025.

Ross 458 C: Gas Giant or Brown Dwarf?
Exoplanets V
Leiden, the Netherlands, June 2024.

Probing Resolved Structures in LIRGs
The 240th meeting of the American Astronomical Society
Pasadena, CA, June 2022.

OUTREACH

F.E.M.M.E.S. November 2025
Volunteered to assist with hands-on astronomy activities for elementary school students through a program aimed at increasing interest in STEM fields for young girls.

PROPOSALS SUBMITTED

James Webb Space Telescope
Distant Substellar Companions and their Origins (as PI) October 2025
➢ 16 hours requested to observe 5 objects.

Hubble Space Telescope
High Above the Main Sequence: the Properties and Fate of Star Clusters in the Most Extreme Starburst Galaxies in the Local Universe (as CoI) April 2021, March 2022
➢ 19 orbits requested

RELEVANT COURSEWORK

Astronomy: Observational Astronomy, Stars & Exoplanets, High Energy Astrophysics, Stellar Structures, Astronomical Techniques, Extragalactic Astronomy, Galaxies and ISM
Physics: Classical Mechanics, Electromagnetism, Quantum Mechanics, Statistical Mechanics
Mathematics: Calculus, Differential Equations, Linear Algebra, Complex Analysis
Computer Science: Software Development Methods, Discrete Mathematics, Program and Data Representation

COMPUTER SKILLS

Programming Languages: Python, C++, C, Java

AWARDS AND HONORS

- ➢ **D. Nelson Limber Award** (for outstanding accomplishments in course work and astrophysics research by a graduating Astronomy-Physics major)
- ➢ **Echols Scholar** (Given to UVA applicants who demonstrate a passion for learning)
- ➢ **Dean's List** (5 times)
- ➢ **National Merit Scholar**

MEMBERSHIP Kappa Kappa Psi, National Honorary Band Fraternity — March 2019 - Present

EXTRA-CURRICULAR ACTIVITIES

University of Michigan Campus Band	August 2025 - Present
Caltech Wind Orchestra	September 2022 - July 2023
University of Virginia Cavalier Marching Band	August 2018 - May 2022

REFERENCES

Prof. Michael Meyer (Ph.D. advisor)
- ➢ Email: mrmeyer@umich.edu
- ➢ Phone: (734) 764-7846

Prof. Aaron Evans (Undergraduate Research Mentor)
- ➢ Email: aevans@virginia.edu
- ➢ Phone: (434) 924-4896

Dr. Christoffer Fremling (Postbac Supervisor)
- ➢ Email: fremling@caltech.edu
- ➢ Phone: (626) 375-9336