

# TIMESTEP Astronomical Software Engineering Internship Program

The TIMESTEP Astronomical Software Engineering Internship places students (juniors and seniors) with *backgrounds in astronomy and/or physics* to **work in small teams on cutting-edge software challenges in the Space Sciences**. Interns will learn about software engineering at industry standards and will be prepared for software careers in industry and to conduct advanced research in graduate school.

This internship offers a rare intersection of astrophysics, software engineering, and AI-driven automation. Candidates with a passion for scientific discovery and computational innovation are encouraged to apply.

## Program details:

- Runs through the 2026-27 Academic Year.
- Accepting students who will be in their 3<sup>rd</sup> or 4<sup>th</sup> year of study (or equivalent) at the UA.
- Preference to students with an astronomy and/or physics major or minor.

### Qualifications:

- Proficiency in Python with experience in scientific computing and/or data processing.
- Familiarity with version control software such as Git.
- Interest in software development, including code optimization and documentation
- Interested in working in a team
- Interest in solving software challenges with applications in Space Science.
- Interest in developing best practices in AI-assisted software development (e.g GitHub Copilot, ChatGPT).
- Strong problem-solving skills and ability to work in a collaborative team environment.

## Responsibilities and Benefits:

### Responsibilities:

- Attend a weekly agile style stand-up meeting and regular technical workshops.
- Communicate clearly and regularly with your team and grad student mentor, using Slack, GitHub, and other tools
- Build, optimize, and document code.

### Benefits:

- Direct involvement in an astrophysical software engineering initiative.
- Learn and apply software engineering best practices to advance the progress of scientific research teams.
- Increase your competitiveness for industry positions, graduate school, and research opportunities
- Pay is for 10 hours per week at \$22.50 per hour.

**Student Outcomes:** The inaugural cohort have gotten REU positions, IBM internships, and acceptance to graduate school.

“The TIMESTEP Astro Software Engineering Internship has given me the opportunity to combine my interests in astronomy and coding—allowing me to do what I really want to do, support black hole research through software engineering.”

**Applications open Wednesday, March 4th and close at midnight Sunday, March 22<sup>nd</sup>.**

For Application Information, resources, and online application link go to [TIMESTEP Astronomical Software Engineering Internship](#). More information at [timestep.arizona.edu](http://timestep.arizona.edu). Reach out to us at [jkinser@arizona.edu](mailto:jkinser@arizona.edu) with any questions.

