

Assistant Researcher - Radio Astronomy Lab

Job #JPF04985

- Radio Astronomy Lab / VC Res Organized Research Units / UC Berkeley

Apply now: <https://aprecruit.berkeley.edu/JPF04985/apply>

View this position online: <https://aprecruit.berkeley.edu/JPF04985>

POSITION OVERVIEW

Salary range: The UC academic salary scales set the minimum pay determined by rank and step at appointment. See the following table(s) for the current salary scale(s) for this position: https://www.ucop.edu/academic-personnel-programs/_files/2025-26/represented-july-2025-scales/t13-b.pdf The current base salary range for this position is \$93,400-122,100. "Offscale" salaries, which yield compensation that is higher than the published systemwide salary at the designated rank and step, are offered when necessary to meet competitive conditions

Percent time: 100%

Anticipated start: August 2025

Position duration: 2 years

APPLICATION WINDOW

Open date: June 9, 2025

Next review date: Monday, Jun 23, 2025 at 11:59pm (Pacific Time)

Apply by this date to ensure full consideration by the committee.

Final date: Thursday, Jul 17, 2025 at 11:59pm (Pacific Time)

Applications will continue to be accepted until this date, but those received after the review date will only be considered if the position has not yet been filled.

POSITION DESCRIPTION

UC Berkeley's Radio Astronomy Laboratory seeks applications for an Assistant Researcher specializing in radio astronomy instrumentation design.

Radio Astronomy Lab experiments span the measurement of primordial inflation in the polarization of the cosmic microwave background, the exploration of the cosmic dawn and reionization of the universe, the direct imaging of black holes, the detection of fast radio bursts from galactic magnetars, and the search for techno-signatures from extraterrestrial life. Most experiments are ground based telescope arrays (e.g. HERA, EIGSEP), but some are space based (e.g. LUSEE, CURIOS).

The primary duties of the Assistant Researcher will be to conduct independent research designing and developing cutting edge electronics and digital signal-processing instrumentation for experiments that facilitate the exploration and understanding of our universe. These instruments include receivers, digitizers, correlators, beamformers, spectrometers, time and frequency distribution systems, RF over fiber transmitters and receivers, and instrumentation for cosmology, pulsar, fast radio burst, and SETI research. Also the Assistant Researcher will collaborate in national and international collaborations. They will also present their research at national and international conferences and publish their work in peer reviewed journals and assist students, postdocs, and visiting scientists with design and development of their astronomy instrumentation.

Division: <https://vcresearch.berkeley.edu/research-unit/radio-astronomy-laboratory>

QUALIFICATIONS

Basic qualifications (required at time of application)

PhD or equivalent international degree or enrolled in PhD program or equivalent international degree program

Additional qualifications (required at time of start)

PhD or equivalent international degree

Preferred qualifications

- PhD or equivalent international degree in Astronomy, Physics, or Electrical Engineering
- At least three years of experience after PhD of independent research designing and developing instrumentation.
- Expertise in electronic circuit design
- Proficiency with: Linux, Python, C, Verilog, VHDL, CUDA, MATLAB, and Simulink
- Expertise in high throughput Digital Signal Processing (DSP), FPGA, and GPU programming
- Experience with high speed ethernet networks, and data transfer from Network Interface Board (NIC) to GPU
- Strong communication skills in order to write reports and correspondence, speak effectively before groups of students and researchers.
- Expertise in printed circuit board layout.

- A strong record of publishing in refereed journals
- Commitment to collaborative development of open-source software
- Familiarity with the work of the Collaboration for Astronomy Signal Processing and Electronics Research

APPLICATION REQUIREMENTS

Document requirements

- Curriculum Vitae - Your most recently updated C.V.
- Cover Letter (Optional)
- Statement of Research
- Publications - List of Publications

Reference requirements

- 3-5 required (contact information only)

Apply link: <https://aprecruit.berkeley.edu/JPF04985>

Help contact: aparsons@berkeley.edu

ABOUT UC BERKELEY

UC Berkeley is committed to diversity, equity, inclusion, and belonging in our public mission of research, teaching, and service, consistent with [UC Regents Policy 4400](#) and University of California Academic Personnel policy ([APM 210 1-d](#)). These values are embedded in our [Principles of Community](#), which reflect our passion for critical inquiry, debate, discovery and innovation, and our deep commitment to contributing to a better world. Every member of the UC Berkeley community has a role in sustaining a safe, caring and humane environment in which these values can thrive.

The University of California, Berkeley is an Equal Opportunity employer. All qualified applicants will receive consideration for employment without regard to race, color, religion, sex, sexual orientation, gender identity, national origin, disability, age, or protected veteran status.

For more information, please refer to the [University of California's Affirmative Action and Nondiscrimination in Employment Policy](#) and the [University of California's Anti-Discrimination Policy](#).

In searches when letters of reference are required all letters will be treated as confidential per University of California policy and California state law. Please refer potential referees, including when letters are provided via a third party (i.e., dossier service or career center), to the [UC Berkeley statement of confidentiality](#) prior to submitting their letter.

As a University employee, you will be required to comply with all applicable University policies and/or collective bargaining agreements, as may be amended from time to time. Federal, state, or local government directives may impose additional requirements.

As a condition of employment, the finalist will be required to disclose if they are subject to any **final** administrative or judicial decisions within the last seven years determining that they committed any misconduct.

- "Misconduct" means any violation of the policies or laws governing conduct at the applicant's previous place of employment, including, but not limited to, violations of policies or laws prohibiting sexual harassment, sexual assault, or other forms of harassment or discrimination, as defined by the employer.
- [UC Sexual Violence and Sexual Harassment Policy](#)
- [UC Anti-Discrimination Policy](#)
- [APM - 035: Affirmative Action and Nondiscrimination in Employment](#)

JOB LOCATION

Berkeley, CA