

Assistant Professor in Astroparticle Physics, Particle Astrophysics or Astrostatistics

The Faculty of Science at Simon Fraser University (SFU) invites applications for a full-time, tenure-track faculty position at the rank of Assistant Professor as a part of a new focus area initiated by the arrival of a Canada Excellence Research Chair in Astroparticle Physics. While an appointment at the rank of Assistant Professor is preferred, exceptional candidates with qualifications for higher ranks may also be considered for appointment at the Associate Professor or Professor levels.

The successful candidate will be expected to develop a vibrant research program, teach effectively at the undergraduate and graduate levels, and contribute to building equitable, diverse and inclusive environments. We invite applications from researchers from a range of disciplines including astroparticle and particle physics, particle detector development, and advanced data analysis and statistical techniques. This program builds on and complements established strengths within the SFU Faculty of Science, including:

- Particle physics and Cosmology (Department of Physics – <https://www.sfu.ca/physics.html>)
- Bayesian methods, Data Science, Machine learning, and Statistical computing (Department of Statistics and Actuarial Science – <https://www.sfu.ca/stat-actsci.html>)
- Scientific Computing, Scientific Machine Learning, and Mathematical Compressed Sensing (Department of Mathematics – <https://www.sfu.ca/math.html>)

Depending on their background and primary interests, the successful candidate may be housed in one or more of the departments identified above. In addition, SFU researchers benefit from close collaboration with Canada's Particle Accelerator Centre, TRIUMF, and the Arthur B. McDonald Institute for Astroparticle Physics.

Qualifications

The successful candidate must:

- Hold a Ph.D. and outstanding scientific record of research in related field such as particle astrophysics, neutrino physics, high energy physics, statistics/machine learning with applications to astroparticle physics.
- Demonstrate scientific potential of future research plans within experimental astroparticle physics collaborations such as IceCube and P-ONE.
- Demonstrate the potential of the research plan to strengthen the SFU astroparticle physics initiative.
- Demonstrate a commitment to equity, diversity and inclusion.
- Demonstrate interest and ability* to realize excellence in teaching and supervision of highly qualified personnel.

The following are considered assets:

- A record of or potential* for leadership in national and international projects in particle astrophysics.
- A record of or potential* for service to the discipline, department, faculty, and/or university.
- Record of or potential* for securing large-scale project funding.

*To be considered for the ranks of Associate Professor or Professor applicants must have an outstanding record in this category

How to Apply

Candidates should address their applications to the Astroparticle Search Committee Chair, Prof. Levon Pogosian. Informal enquires about this position may be directed to either Prof. Levon Pogosian (levon_pogosian@sfu.ca) or Prof. Darren Grant (darren_grant@sfu.ca).

Applications will consist of a single PDF, submitted by email to Physics Chair Assistant at physchairsec@sfu.ca, inclusive of the following components:

- A concise cover letter (maximum two pages) that addresses the following items: 1) reasons for applying to the position, and 2) a narrative description highlighting evidence that the candidate meets the job qualifications and would effectively fulfil job expectations.
- A complete up-to-date curriculum vitae that lists the candidate's education and employment history, publications and conference presentations, funding and awards, student supervision, collaborations/partnerships, teaching experience, and service activities.
- A research statement (maximum three pages) that describes the candidate's research experience, goals, and a five-year plan for their research program.
- Three examples of peer-reviewed published scholarly work.
- A teaching statement (maximum two pages) that describes the candidate's teaching philosophy, teaching experience, and evidence of teaching effectiveness.
- A statement (maximum two pages) describing past or potential contributions to enhancing equity, diversity, and inclusion within research, service, and teaching.
- The names, titles, and email addresses of three referees who are qualified to assess the candidate's research, service and, if possible, teaching capabilities. Referees will be contacted by SFU for candidates advancing to the later stages of the selection process.
- The candidate's legal status to work in Canada.

Full consideration will be given to applications received by **November 25, 2024**. Applications received after this deadline may be reviewed if the position is still open.

About SFU

Simon Fraser University (SFU) is one of Canada's top-ranked comprehensive universities. With three campuses located in beautiful British Columbia's largest municipalities—Vancouver, Burnaby, and Surrey—our students, faculty, and staff are privileged to live and work on the traditional unceded territories of the xʷməθkʷəy̓əm (Musqueam), Sḵw̓x̓wú7mesh Úxwumixw (Squamish), səliłwətał (Tsleil-Waututh), qííćəy̓ (Katzie), kwikwəłəm (Kwikwetlem), Qayqayt, Kwantlen, Semiahmoo, and Tsawwassen peoples. Consistently ranked as one of Canada's top employers, SFU's takes pride in fostering a supportive and accommodating environment for all our members.

Simon Fraser University is an institution whose strength is based on our shared commitments to diversity, equity and inclusion. Diversity is an underlying principle of our Strategic Vision, which pledges SFU to “foster a culture of inclusion and mutual respect, celebrating the diversity reflected among its students, faculty, staff, and our community.” SFU is committed to ensuring no individual is denied access to employment opportunities for reasons unrelated to ability or qualifications. Consistent with this principle, SFU will advance the interests of underrepresented members of the work force, including Indigenous peoples, persons with disabilities, racialized persons and women; embrace gender and sexual diversity; ensure that equal opportunity is afforded to all who seek employment at the University; and treat all

employees equitably. Candidates that belong to underrepresented groups are particularly encouraged to apply.

We take pride in fostering a supportive and accommodating environment for all our members. Situated on the Burnaby campus, we are a short walk from the University Childcare Centre, athletic facilities, and scenic hiking trails.

Faculty salaries at SFU are based on scales negotiated between the University and the SFU Faculty Association. A reasonable estimate of the base salary range for this role at the Assistant Professor rank is \$104,700 - \$142,863, depending on experience. The estimated base salary range for Associate Professor is \$130,142 - \$168,305, and for Professor is \$149,225 - \$196,292, depending on experience.

SFU offers several benefits and services aimed at creating a more inclusive and accessible campus community for faculty; please see the Faculty Relations, Benefits and Service page for more details (<https://www.sfu.ca/faculty-relations/benefits-services.html>). SFU is also committed to ensuring that the application process is accessible to all applicants. If you require accommodations or have questions about SFU benefits, services, accommodations policies, or equity considerations, please contact the Specialist, Equity, Diversity and Inclusion in Faculty Relations.

All qualified candidates are encouraged to apply; however, Canadian citizens and permanent residents will be given priority. Personal information that forms part of an application is collected under the general authority of the Freedom of Information and Protection of Privacy Act, applicable University Policies, and the SFUFA/SFU Collective Agreement. For further details see the full the [Collection Notice](#).

The position is subject to availability of funding and approval by the SFU Board of Governors.