

## **Mathematics of Machine Learning and Artificial Intelligence**

The Department of Mathematics at the University of British Columbia in Vancouver seeks candidates for a tenure-track Assistant Professor position, with a starting date of 1 July, 2023.

We seek candidates with expertise in the mathematics of Machine Learning and Artificial Intelligence (AI). Specific topics of interest include, but are not limited to, neural nets, statistical learning theory, inverse problems, optimization, mathematical data science, and mathematics of information. Your research should have a strong theoretical component, a focus on AI Methods, and interdisciplinary scientific impact.

You should hold a PhD or equivalent in mathematics or a related discipline. Postdoctoral experience is normally expected. You should be a creative, innovative scientist, with demonstrated research accomplishments and evidence of commitment to effective teaching. You will be expected to maintain a dynamic externally funded research program, and to take active roles in teaching and service, as well as supervision of trainees (graduate, undergraduate and postdoctoral researchers). You will have a strong commitment to equity, diversity, and inclusion, to create a welcoming community for all, particularly those who are historically, or systemically marginalized

You will join a new interdisciplinary research cluster, AI Methods for Scientific Impact (AIM-SI), within UBC's Centre for AI Decision-making and Action (CAIDA). CAIDA consists of over 100 researchers whose research leverages AI. Beyond AIM-SI, you will join an expanding team of researchers who are highly active in the core AI Methods research community. We are looking for someone who is ready to build research collaborations - informal and formal - with other researchers in AIMS-SI, CAIDA, across the mathematical sciences and the university as a whole.

For more information about the Department of Mathematics, AIM-SI and CAIDA, please visit the following websites:

<https://www.math.ubc.ca>

<https://caida.ubc.ca/aim-si>

<https://caida.ubc.ca>

We take our commitment to equity, diversity, and inclusion seriously, and we strive to offer a productive and inclusive space for all department members. University-

wide strategic priorities are outlined in the UBC Inclusion Action Plan (<https://equity.ubc.ca/about/inclusion-action-plan/>) and the Indigenous Strategic Plan (<https://isp.ubc.ca>). Equity and diversity are essential to academic excellence. An open and diverse community fosters the inclusion of voices that have been underrepresented or discouraged. **Inclusion is an individual and institutional responsibility, built through engagement with diversity in all its forms.** We encourage applications from members of groups that have been marginalized on any grounds enumerated under the B.C. Human Rights Code, including sex, sexual orientation, gender identity or expression, racialization, disability, political belief, religion, marital or family status, age, and/or status as a First Nation, Metis, Inuit, or Indigenous person.

Applications should be submitted through the AMS MathJobs website, <https://www.mathjobs.org/jobs/UBC/> and include the following:

- current CV including list of publications;
- research statement (typically 3-5 pages) describing your work to date and future plans;
- interdisciplinarity statement (not to exceed two pages) that emphasizes your track record and describes your future plans for AI methods research, aiming at interdisciplinary scientific impact. This statement should also describe and advocate for a workshop you would be interested in helping to organize at UBC, reaching both AIM-SI members and interdisciplinary researchers beyond the cluster;
- teaching statement (typically 1-2 pages);
- diversity statement (typically 1-2 pages) describing your experience working with a diverse student body and your contributions to creating/advancing a culture of equity and inclusion on campus or within your discipline.

Your application should have connected to it four signed letters of reference (dated, on letterhead, with at least one addressing your teaching), submitted directly to Mathjobs by the referees.

Review of applications will begin on 15 November, 2022. All qualified candidates are encouraged to apply; however Canadians and permanent residents of Canada will be given priority.

Within this hiring process we will make efforts to create an inclusive and equitable process for all candidates (including but not limited to people with disabilities). Confidential accommodations are available on request for applicants who are short-listed by contacting Kylie Prokopetz via [kylie.prokopetz@ubc.ca](mailto:kylie.prokopetz@ubc.ca) or 604-822-6985.