

## **Graduate student opportunity in neurological and cardiovascular disease interactions**

A graduate student position (PhD or Masters) is available in the laboratory of Dr. Melanie Alpaugh at the University of Guelph commencing in Fall 2024/Winter 2025.

**Project description:** Increasing evidence points to a relationship between heart disease and dementia, with risk factors such as hypertension being associated with a heightened risk of developing disease. However, the contribution of heart disease and changes to blood vessels are less well understood in many other brain disorders. In the Alpaugh Lab, we are using a combination of human tissue, human cell modeling and animal studies to better understand how changes to the cerebral vasculature can modify features of a range of brain disorders including Huntington's disease and Schizophrenia. The successful applicant will contribute to this overall research objective by evaluating the effects of anti-hypertensive therapies in a mouse model of Huntington's disease. This will include performing behavioural testing in mice and post-mortem analysis of the brain and heart.

**Requirements:** The Alpaugh lab is looking for a dedicated and hard-working student who is passionate about understanding the underlying mechanisms of neurological diseases and eager to work in a collaborative environment. The successful applicant will be performing experiments with animal models therefore a willingness to work with mice is required. Any previous experience working with animal models will be considered as an asset. Other tasks will include basic biochemical methods such as immunofluorescence and western blotting so experience with such methods is also preferred.

**Funding:** Masters and PhD students in the College of Biological Science are funded at a minimum of \$22,460 and \$25,460 per year, respectively.

**Application instructions:** Interested individuals may apply by submitting a complete application package as a single PDF file to Dr. Melanie Alpaugh ([alpaughm@uoguelph.ca](mailto:alpaughm@uoguelph.ca)) before May 13<sup>th</sup>, 2024. Only complete applications will be considered for this position and shortlisted candidates will be contacted within 14 days of the posting closing date (May 27<sup>th</sup>, 2024) to initiate the interview process. Preference will be given to Canadian citizens and permanent residents.

A complete application package includes:

1. A cover letter including a description of previous research experience and future career goals
2. A curriculum vitae
3. Unofficial transcripts
4. Names and contact information for 2 referees

We invite and encourage applications from all qualified individuals, including from groups that are traditionally underrepresented in higher education.