Recruitment Offer for master's or Ph.D. student

We are looking for a student interested in pursuing a master’s or Ph.D. at the intersection of Neuroscience and Artificial Intelligence (AI) under the supervision of Dr. Dang K. Nguyen (neurologist, full professor at UdeM, and researcher at CRCHUM) and Dr. Elie Bou Assi (IVADO assistant professor at UdeM and researcher at CRCHUM).

Description of the research project:
Epilepsy is one of the most prevalent neurological conditions, affecting nearly one percent of the world's population. Today, although more than two thirds of patients with epilepsy respond adequately to pharmacological treatments or are candidates for resection surgery, a third live with persistent, disabling and unpredictable seizures. These seizures can be accompanied by risks of adverse events, ranging from mild injuries to sudden unexplained death in epilepsy and hypoxia. In order to minimize these risks, rapid intervention is necessary to assist patients experiencing a seizure. However, both in the context of hospitalization and in their daily environment, it can happen that no intervention is made or that the intervention is too late. The goal of this research project is to develop an algorithm based on AI techniques and connected objects for the detection of epileptic seizures. Indeed, in the event of a seizure, such an algorithm would be able to detect it quickly and generate alarms, thus warning relatives, friends, caregivers, or other medical personnel.

Requirements:
- Hold a bachelor's or master's degree in health sciences or engineering
- Good knowledge of French and English
- Mastery of Matlab and / or Python

Required profile:
- Motivation, scientific curiosity, and dynamism
- Competitive CV for scholarships and awards at provincial and national level
- A background in neuroscience and / or engineering is an asset

Status:
- Full-time
- Location: CHUM research centre
- Enrollment in the master's or doctoral program in neuroscience at the University of Montreal with a submission of a thesis at the end
- Salary and conditions according to CRCHUM policies

To apply:
Interested candidates are requested to send the following documents:
- Cover letter
- Complete CV
- University transcripts
- Contact details of 2 reference persons

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