Postdoctoral Fellow
Applied Neuro-Vascular Imaging Lab
Northwestern University, Chicago, IL

The Applied Neuro-Vascular Imaging Lab at Northwestern University has an opening for a full-time Postdoctoral Fellow to develop advanced MRI techniques to assess the interaction of neural activity and vascular physiology. These techniques will be applied in several collaborative themes, studying novel therapeutics in rehabilitation, exploring brain-body relationships in aging, and characterizing motor impairment and plasticity in children and adults following stroke. There is opportunity and support for the Fellow to initiate and lead new directions in basic and clinical research. This position is for a minimum of 2 years with the possibility to extend.

Qualifications
Candidates are expected to meet the following essential criteria:

- PhD in biomedical engineering, neuroscience, medical physics, or related field
- Research experience in fMRI acquisition and pre-processing methods
- Excellent communication and writing skills in English
- Competence in a high-level programming language (e.g. MATLAB, Python, or similar)
- Familiarity with neuroimaging analysis tools (e.g. AFNI, FSL, FreeSurfer)

In addition, expertise and interest in some or all of the following is desired:

- Arterial Spin Labeling and perfusion quantification
- Physiological stimuli (e.g. breath-hold, gas challenges, blood pressure manipulations)
- Modeling cerebral physiology
- Functional connectivity analyses
- Real-time signal processing or machine learning

Candidates should also indicate any mentoring, professional development, or outreach activities they have undertaken.

Facilities at Northwestern University
The position will involve collaboration across the departments of Physical Therapy and Human Movement Sciences, Biomedical Engineering, and Radiology, and the Fellow will be based in the downtown Chicago campus. The Center for Translational Imaging is a world-class facility housing state-of-the-art MRI equipment, including two Siemens 3T Prisma scanners dedicated to neuroimaging research. Clinical collaborations may also involve the Shirley Ryan AbilityLab, the first-ever “translational” research hospital where clinicians and scientists work together in the same space.

Application Procedure and Deadline
Interested applicants are encouraged to contact Prof. Bright for further information. To apply, applicants should submit a CV, cover letter, and contact information for up to 3 references by email to the lab director:

Molly Bright, D.Phil.
molly.bright@northwestern.edu
brightlab.northwestern.edu

Applications received by July 2, 2018 will receive full consideration.

Northwestern University is an Equal Opportunity, Affirmative Action Employer of all protected classes, including veterans and individuals with disabilities. Women, underrepresented racial and ethnic minorities, individuals with disabilities, and veterans are encouraged to apply. Hiring is contingent upon eligibility to work in the United States.