Seminar Announcement

Friday, February 8, 2019
12:00 pm – 1:00 pm
HRC-H1210/H1230
Medical College of Wisconsin

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Abstract

“Advancing MRI Techniques for Spinal Cord Injury”

Spinal cord injury (SCI) is a devastating injury with a pronounced long-term impact on quality of life. Medical care in the acute period is critical to outcomes, and a primary goal is to minimize damage occurring beyond the initial insult (i.e. secondary injury). While advanced MRI methods including diffusion- and perfusion-weighted imaging have emerged as integral tools for patient care in other acute injuries, especially cerebral ischemia, similar advances have not been realized for the spinal cord. MRI of the spinal cord is more challenging given its small size, the effects of motion, and the presence of bony structures that perturb the magnetic field. This talk will discuss the work of my lab to advance MRI of the spinal cord aimed at detecting the degree of injury, predicting neurological outcomes, and potentially guiding established and emerging therapies. I will describe how we use a variety of approaches across the translational spectrum, from computational modelling of neuronal injury to animal models and more recently clinical studies of human SCI. Our ultimate goal is to enhance MRI as a clinical tool that can aid in improving outcomes of those that suffer from such a potentially life-altering injury.

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Medical College of Wisconsin is located on 1101 N. 87th St., Milwaukee, WI 53226. Parking is available across the street in visitor parking. Refreshments will be served.