## Special Day

## **Quantum optics for** fundamental tests and applications

**Christoph Simon** 

**University of Calgary** 

July 19, 2018 4:00 p.m. - Wilson Hall, One West

I will describe the many facets of quantum optics research through examples from my own career. In particular, I will talk about theoretical and (in many cases) experimental work on demonstrating quantum non-locality, on bringing quantum effects such as superposition and entanglement to the macroscopic level, on implementing a global quantum network, on the possible existence of photonic communication channels in the brain, and on super-resolution imaging.

