



## Physical Sciences Seminar

# R. Ursin's talk is **CANCELLED**

**Rupert Ursin (Austrian Academy of Sciences)**

**Host: Johannes Fink**

Quantum networking is the next big issue in quantum communication science. We recently implemented a WDM fiber network, deploying polarization quits for four users. This network is scalable and fully connected - the perfect start for a future quantum internet [1]. I will discuss recent experiments we performed in collaboration with the Chinese Academy of Sciences using a LEO Satellite to perform quantum link to an optical ground station in Graz. Further I will discuss my future plans to implement a 24/7 quantum network spanning on international glas fibers between Vienna-Bratislava and Budapest and possibly also beyond.[1] 1. Wengerowsky, S., Joshi, S. K., Steinlechner, F., Hbel, H. & Ursin, R. Entanglement-based wavelength multiplexed quantum communication network. *Accept. Publ. Nat.* (2018). (<https://arxiv.org/abs/1801.06194>)

**Wednesday, November 21, 2018 03:00pm - 04:00pm**

IST Austria Campus Mondi Seminar Room 2, Central Building



This invitation is valid as a ticket for the IST Shuttle from and to Heiligenstadt Station. Please find a schedule of the IST Shuttle on our webpage: <https://ist.ac.at/en/campus/how-to-get-here/> The IST Shuttle bus is marked IST Shuttle (#142) and has the Institute Logo printed on the side.