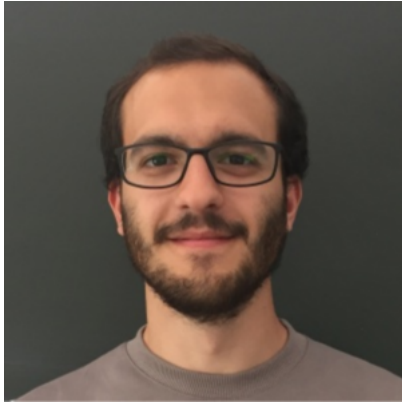




Davide Rusca



- Name: Davide Rusca
- Project: Novel approaches to simple and secure QKD systems
- Nationality: Italian
- Institution: Group of Applied Physics, University of Geneva
- Supervisor: Hugo Zbinden

Short Bio

My studies were carried out in Italy at the Politecnico di Milano where I graduated in Engineering Physics. In that period I had the opportunity to study both physics and Engineering subjects.

I did my master thesis in the lab of Dr. Roberto Osellame at the Institute for Photonics and Nanotechnologies in Milan: there I had the opportunity to work on integrated quantum photonics and specifically I worked on the fabrication of photonic devices with the femtosecond laser micromachining technique.

Research Profile

When I applied for this position, I wanted to drive my research into the quantum communication world.

My project revolves around the world of Quantum Key Distribution and more general in the Quantum Cryptography field. The aim should be to work on the creation of novel protocol for



quantum key exchange and to prove their security.

By having an experimentalist background and diving now into the world of theoretical security proofs, the idea is to combine the best of both worlds and to produce secure and feasible quantum protocols.