PHOTONIC INTERNSHIP JOB DESCRIPTION

One of the greatest commodities of our times is the ability to exchange information online, securely. However, the security of our current encryption methods is vulnerable, and we know that their security will render obsolete with the advent of new technologies, such as quantum computers.

At Quside, we design and manufacture innovative quantum components for all connected devices. Using our proprietary quantum random number generator, we provide the security and performance that is required to build the next generation of encryption technologies. A new class of products and infrastructure with unprecedented future-proven security guarantees. Our mission is to make sure that secure communications keep being a commodity in the years to come.

Job overview - At Quside we're looking for a highly motivated graduate-level intern to work with our photonics team on photonic integrated technologies. The research intern will be responsible for measuring passive and active photonic chips and analyze the results for a new technology for quantum random number generation.

Objectives of this Role

At Quside, you will have the opportunity to work in a high-tech environment and contribute to the development of the company's products. You will work directly with the product development team on characterizing and verifying new photonic technologies. The main responsibilities include:

- Optimize an experimental setup to characterize photonic integrated circuits (PICs)
- Designing and deploying PIC control subsystems
- Writing scripts for automating measurement processes
- Analyzing measurement results and debugging.
- Presenting results to colleagues and prepare detailed reports
- Publishing in international journals and contributing to international conferences

During the internship, you will be assigned a mentor to support you through this valuable hands-on experience. The position is offered for a minimum time of 6 months. The duration can be extended depending on student's availability.

Skills and Qualifications

- Currently enrolled in a Master's or PhD program in a discipline such as photonics, electronics, physics or related field. Recent graduates are also encouraged to apply.

Ph.D graduates with experimental background, looking for a career change, are also encouraged to apply.

- Proactive, results-focused and passionate about hands-on lab work
- Good programming skills (Python or experience with Matlab)
- Excellent communication and presentation skills and ability to work in a multidisciplinary team
- Experience with photonic integrated circuits (PICs) or fiber-to-chip coupling (grating coupling or edge coupling) is a strong plus
- Experience in R&D environments is a strong plus.

Contact: careers@quside.com