Optoelectronics Engineering Position

We are seeking an Optoelectronics Engineer to join our team in Lausanne, Switzerland. **The position is open as a Master's thesis project or a permanent position, depending on your experience.**

The Company

Deeplight is a privately held high-tech spin-off company, founded in 2021 by researchers from the Swiss Federal Institute of Technology in Lausanne, Switzerland (EPFL) and from Karlsruhe Institute of Technology (KIT), Germany. We specialize in developing frequency-agile laser sources and optical frequency combs with ultra-low phase noise based on advanced photonic integrated circuits. Our technology base enables us to cater to scientific, industrial, and consumer markets with significant economic potential, directly powering advanced applications such as optical communications, distributed fiber sensing, FMCW LiDAR, and quantum computing.

Responsibilities

- Design, build, and test electronics for low-noise laser controller systems, with a focus on digital control and embedded firmware
- Lead MCU-based development: firmware architecture, peripheral configuration (SPI, I2C, UART, ADC/DAC interfaces), and real-time control loops
- Read and interpret electrical schematics, including analog signal chains relevant to laser drive and noise performance
- Develop and maintain LabVIEW or Python-based instrument control, data acquisition, and automation software
- Support lab instrumentation setup, calibration, and troubleshooting
- Document designs, firmware, test results, and procedures

Your Profile

As part of a team of highly skilled physicists and engineers, you will contribute to the development of hybrid laser systems and grow your expertise in a collaborative setting.

Requirements:

- Enrolled in or holding a BS, MS or PhD degree in Electrical Engineering, Computer Engineering, Physics, or related field
- Hands-on experience with MCU-based development (Arduino, STM32, ESP32, or similar), or strong motivation to learn for thesis candidates
- Ability to read and understand electrical schematics
- Python programming for lab automation or data analysis

Nice to have:

- Solid understanding of analog design concepts (op-amps, filters, low-noise techniques), *expected for the permanent position*
- LabVIEW experience
- PCB and 3D CAD design experience

Join us

- A place where you can develop your skills in a growing team committed to Agile methodologies with the room to take ownership and to bring in your ideas
- Continued learning, both through on-the-job training and formal training
- Competitive compensation and a flexible and inspiring work culture, in the beautiful location of Lausanne, Switzerland
- **Activity rate:** 100%; Master's thesis (duration per university requirements) or permanent position
- **Place of work:** Lausanne, Switzerland
- **Start date:** As soon as possible or by agreement

Application

Please submit your application by filling out the form at the following link: https://deeplight.fillout.com/optoelectronics-engineering, or scanning the QR code:

Recruitment agencies: Without a prior written and signed agreement, all candidate submissions will be considered direct applicants with no agency fees.