# Embedded Software Engineer IoT development tools and MCU-based applications

#### Overview

We are looking for an embedded software engineer. You will join a collaborative team to develop, test and maintain the Zerynth Virtual Machine (VM) and the related tools of the Zerynth software Stack. You will be responsible for software development during all phases of the development cycle, including requirements, design, implementation, testing, integration, and documentation.

### Responsibilities

- Extending the architectures and device set supported by the Zerynth VM;
- Designing, developing, and testing drivers and middlewares to extend the peripherals set supported by the Zerynth VM;
- Maintaining new and existing software to enhance feature sets and to consistently improve stability and quality;
- Working in a small team environment in collaboration with system engineers to develop optimal solutions to IoT challenges;

#### **Experience and Requirements**

Experience and passion in embedded software development, focused on 32 bit microcontrollers from different architectures (Cortex-M preferred). Additional experience developing bare-metal firmware with microcontrollers is desirable. The ideal candidate is highly motivated, self-starting, enthusiastic, fast-learning and can perform autonomously.

- Master Degree in computer science, computer engineering, electronics engineering or equivalent degree required. BSc in such fields will be considered too;
- Fluent in written and verbal english;
- Knowledge in the area of communication protocols at all layers, such as I2C, SPI, USART, BLE, and TCP/IP protocols;
- High competency developing in C language;
- Knowledge of high level languages and concepts, preferably Python;
- Familiarity with major stages of the software development cycle, including requirements generation, design, implementation, and testing;

#### TOOLS:

- Experience with embedded RTOS development (FreeRTOS preferred);
- Experience with common open-source configuration management and testing tools: git, Jenkins, gdb, openocd;
- Experience with open-source environments and development tools, such as Linux, GNU cross-compiler toolchains, Makefiles;
- (Nice to have) Experience in PIC32 and xTensa architectures;

## Company

Zerynth is a dynamic and fast growing company headquartered in Pisa (Italy) and New York City (US). We reach beyond professional embedded developers to also offer high-level programmers, product designers and IoT developers a complete set of high-quality embedded development tools to create interactive and connected solutions.

Zerynth proprietary technologies are tailored for designing embedded applications and IoT connected devices using any 32-bit microcontrollers and connecting to any cloud infrastructure. All in Python & hybrid C/Python language. Defined as the "Android of the Embedded World", the Zerynth modular set of software tools enables to create flexible, scalable and customizable IoT solutions, reducing the time to market and the overall cost.

# **How to Apply**

If you are interested in working with us, please send the following documents:

- curriculum vitae
- a short presentation

to this e-mail address: jobs@zerynth.com