

Embedded Firmware Developer (ARM MCU)

Job Code: PYGO-2019-FW-2

Term: Fulltime, Contract Position

Location: Edmonton, AB

This position is open to **Entry-Level Graduates** with experience in bare metal programming of ARM 32-bit microcontrollers. Candidates with proven embedded C/C++ and software development experience are preferred.

Key Qualifications (Preferred):

1. Experience developing embedded solutions with the C/C++ programming language, and developing peripheral interfaces: SPI, I2C, USART, GPIO, Ethernet, etc.
2. Skills utilizing the C programming language must be well developed.
3. Some experience using scripting languages like Python or JavaScript.
4. Proficient working with development tools such as ARM CMSIS, Keil® MDK, Eclipse CDT, etc.
5. Familiarity with hardware debugging using JTAG, SWD, OpenOCD, J-Link or a similar toolset
6. An understanding of the embedded product development process – prototyping to market launch.
7. Experience of fabricating a PCB with an original design made in CAD software such as EAGLE or Altium.
8. Evidence of being able to quickly learn and adapt new skills independently.

Job Description:

You will work with a small team of highly motivated entrepreneurs who are on a mission to develop the next-generation of Industry 4.0 Internet-of-Things (IIoT) products and edge computing technologies. As an embedded firmware developer, you will spearhead the following activities:

1. Develop SoC/SoM low-level peripheral drivers through to high level application code.
2. Write efficient/low power embedded C and C++ solutions using ARM microcontrollers.
3. Utilize frameworks like STM32 HAL/LL, FreeRTOS and ZepherOS.
4. Undertake writing, debugging, optimizing, testing, porting and documenting embedded code
5. Using scripting languages, like Python or JavaScript, to develop various high-level applications.
6. Develop and integrate firmware from the early concept phase through release to manufacturing

Education:

BS/MS in Electronics, Electrical, Communication, Computer Engineering or a related field (such as Engineering Physics)

Work Authorization:

Must be a **Canadian Citizen or a Permanent Resident** to be eligible for this position. There is no relocation or expense package offered for this position.

Please forward your resume, CV, transcripts, and portfolio/GitHub repo if any to Koltin Kosik-Harvey via email: koltinkh@pygo.io