Evan **Lojewski**

FIRMWARE DESIGN ENGINEER

📱 +1 (719) 339-9650 | ✉ elojewski@acm.org | 🏠 lojewski.xyz | 🐙 meklort | 💼 evanlojewski

Education

University of Colorado, Colorado Springs   *Colorado Springs, Colorado, USA*
B.S. IN ELECTRICAL ENGINEERING, MINOR IN COMPUTER SCIENCE   *December 2011*
GRADUATE LEVEL COURSES IN COMPUTER SCIENCE   *2017 - 2018*

Skills

Programming	Embedded firmware using C/C++, Assembly (x86, ARC), Make and CMake based build systems, Testing
Applications	Altium PCB Designer, Jenkins Continuous Integration, Gerrit Code Review, PCLint static analysis
Operating Systems	Linux, Windows, and macOS including device driver development
Other Skills	Prototyping and debugging PCBs including capture and layout
Languages	English

Experience

Apple Inc.   *Cupertino, California, USA*
SYSTEMS FIRMWARE ENGINEER - INCUBATION   *Oct. 2022 - Present*
- Modified bootloaders and existing firmware for new product developments
- Designed new embedded software used on multiple FPGA soft-CPUs (LM32, Microblaze)
- Enabled simulation environments for cross-functional partners to begin early development

EM Microelectronic-US Inc.   *Colorado Springs, Colorado, USA*
SR. STAFF FIRMWARE DESIGN ENGINEER   *Jan. 2012 - Sep. 2022*
- System architect and Lead Designer for mass market products (optical sensors, magnetomiters, sensor fusion)
    - Sensor Fusion firmware used in six different ASICs, designed for extensibility and portability.
    - Created customer SDKs to allow for customer extensibility
    - Optical Sensor firmware enabled sharing code amungst family of sensors, superseding legacy model
- Customer sales and support visits
    - Assisted customers with bringup of devices.
    - Joined the sales team on pitching devices and technical support.
- Managed remote site employees (transatlantic)
- Monitored software builds and firmware quality
- Setup development servers with
    - Gerrit Code Review, Phabricator (git and svn servers)
    - Jenkins, Build Bot (continuous integration)
    - PCLint, Coverity (static analysis)

EM Microelectronic-US Inc.   *Colorado Springs, Colorado, USA*
ASSOCIATE ENGINEER   *Fall 2009 - Dec. 2011*
- Customer support via phone, email and in person visits.
- Developed internal tools for testing and qualification of ICs.
- Software development for microcontrollers and websites.

Extracurricular Activity

Reimplemented firmware for BCM5719 NICs
HTTPS://GITHUB.COM/MEKLORT/BCM5719-FW   *2018 - Present*
- Implemented replacement firmware for the MIPS processor performing early bringup of the MII attached PHY (RX CPU).
- Implemented replacement firmware for the ARM processor, handling NC-SI communication (APE CPU)
- Enabled firmware updates via the Linux Vendor Firmware Service.

Publications

LwProf: Lightweight Profiling and Coverage Tool for Embedded Software   *ESCS'2018*
A NEW TOOL FOR ENABLING TEST COVERAGE METRICS ON EMBEDDED SYSTEMS.   *July 28th - Aug 2nd*
- http://cs.uccs.edu/~kjustice/papers/ESC4300Evan.pdf