CONTACT ME

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www.debled.com

EDUCATION

Master's Degree
UMONS | Computer Science
@Mons, 2012-2018

High School
McCutcheon High School
@Lafayette, IN, USA 2011-2012

Secondary studies
Math & Sciences
2005-2011

SKILLS

Programming
C • Rust • Python • MicroPython

Embedded
Yocto • Kernel • Drivers • Device Tree • U-Boot • UBI/UBIFS

Technology
MQTT • Docker • Zigbee • LoRa • Grafana • InfluxDB • ESP32 • AVR

Web
HTML • CSS • JavaScript

Tools
Git • Jira • CLion • Altium Designer • Jenkins • Redmine

Communication
French: Native speaker and writer
English: Fluent speaker and writer

Benoît Debled

Embedded Engineer

I am an Embedded Engineer with a passion for the digital world, which began at a very young age. I have always loved the interraction between the technological world and the real world. Basically, I am a curious mind, committed to sustainability, eager to learn and improve, and driven to find creative solutions to challenges for a better society

WORK EXPERIENCE

HMS | Nivelles Embedded Engineer 2018 - 2023

Ewon by HMS is a company making industrial router with the goal to enable remote access and remote data to machines. As an embedded developer I have worked on Cosy+, Cosy131 and Flexy 205 product family. Here are some technologies I have worked with while working at Ewon: C, Rust, Yocto, U-Boot, Kernel drivers, Device Tree, Docker, UBI/UBIFS, UTF-8. Moreover, I have worked on many projects such as the implementation of a MindSphere connector and a Lego Machine. For a year, I have took a lead dev role. My role as a lead dev was to make sure that the project the team was working on had clear requirements, clear priorities. I also gave guidance on technological choices and followed up on the project .

Drooney | Liège Intern Sept 2016 - Nov 2016

Conception of a low-power sensor transmitting via LoRa and powered via Arduino. During this internship, I conceived from scratch the sensor using Altium Circuit Maker, managed the different LoRa layers (Router, Network, etc.), and also developed the database for the sensors's data and a web interface to visualize and analyze this data.

Group-IPS | Nivelles Student Job Aug 2015 - Sept 2015

Substitution of the company's IT Manager for 3 weeks after working with him for the same amount of time.

Sollix | Orchies (France) Student Job Jul 2012

My job consisted of the migration of a mail system of a 50+ workers company from Zimbra to Microsoft Office 365

PERSONNAL PROJECTS

More information here: https://blog.debled.com

Home Automation
Automation of my house using a MQTT broker on a Raspberry Pi. Custom made PCB with ESP32 to have a MQTT interface to outputs, inputs, Wiegand and temperature sensors.. Lights, front door, heating system, energy consumption are automated and graphics are generated.

snapClassify **Organize your photos easily!**
Development of a desktop application using Electron and Angular. A GPS tracker was also developed using Arduino (microcontroller SAMD21E18A). The PCB of the tracker has been designed using Altium Designer and a custom 3D printed case was conceived. This project received 5 prizes during the Inno Pepites Junior contest

Aquarium Light System
Controlling an aquarium light system. Eights LEDs are individually controlled via an Arduino (microcontroller SAMD21E18A). Time is synced via a NTP server. It is possible to set rules. A rule can be: set the lights at 80% every Monday and Tuesday at 6PM. There is a web interface to control the system

Alarm Clock **Wake up by a sunrise simulation and nature sounds.**
An Arduino mega controls the display, the buttons, the light sensors,... A Raspberry Pi controls the audio.

Quadcopter
Building, tinkering, flying

AWARDS

Citizens of Wallonia Hackathon Jury Prize
HackUPC Hackathon Second Prize
Inno Pepites Junior: snapClassify First Prize & 4 other prizes