# Luca Mehl

+44 (0) 759 879 7907 | luca.mehl20@imperial.ac.uk | London, UK

## **Education**

### 2020-2023 BEng Computing Imperial College London (2<sup>nd</sup> Year)

- Modules include Logic & Symbolic Reasoning, Operating Systems, Compilers, Algorithms, Discrete math, etc.
- Regularly worked in small groups of 2-4 for up to 3 months, and had hands-on experience planning, building, and delivering projects, as well as with key technologies such as version control in Git and continuous integration / automated testing.

### **Projects**

### PintOS Operating System

 Built a primitive UNIX operating system in C, implementing scheduling (priority donation and multilevel feedback queue scheduling), user/kernel partitioning and system calls, and virtual memory, from scratch in a group of 4 over a 3-month period.

#### ARM Assembler & Emulator

 Created a fully functional ARM assembler and emulator written in C according to the ARM specifications, in a 4-person group over 2 months.

#### • IC Hello World Hackathon

 Designed a green investing web app for profitable and green stocks based on a combination of indexes, built with a React frontend and Python Flask backend.

## 2013-2020 International School of Geneva, Campus des Nations

- IB Bilingual Diploma: 44/45
- Higher level courses: Math (7), Physics (7), Geography (7)
- Standard level courses: Chemistry (7), English A (7), French A (6)

# **Work Experience & projects**

### **Autonomous Weather Station**

 Multi-year (ongoing) project to build an autonomous high-alpine weather station, employing highly optimized low-power circuits & sensors, LoRaWAN for IoT, and solar power for electricity generation.

### MIT Unmanned Autonomous Vehicle Synthetic Aperture Radar

• Scored first place in a project to build a multicopter-mounted radar imaging system, processed with a Raspberry Pi. Completed in a 4-Person team over 1 month.

## Internship at CERN

• Interned at the CERN web dev. department and was embedded in 2 Scrum teams building data visualization tools and user interfaces.

# **Programming languages**

- Preferred: C, Kotlin, Java, Python, Haskell
- Familiar with: PHP+SQL, Bash, HTML+CSS+JS

# **Additional Skills**

- Cyber Security (UK Gov't CyberStart Essentials)
- Significant experience using and programming low-power microcontrollers (e.g. Arduino) and peripherals

#### **Interests**

 Active member of the IC Mountaineering Society and the Caving Society and highly involved with the Imperial Advanced Hackerspace and IC Robotics Society