

George Hearnden

Contact
+44 (0) 7840 377992
hearndengw@gmail.com

georgehearnden.uk
github.com/geeisboard

Personal Statement

I am a reliable, upbeat team player with a range of hardware and software development experience. Passionate about audio, physical computing and embedded systems. Strong communication and people / client skills due to an extensive background in hospitality and ambassador sales roles.

Professional Experience

Maintain Altitude - Junior Unity Developer (JUNE 2025 - AUGUST 2025)

- Debugging and updating minigames and its music data importing system for a music-based mobile game for iOS and Android to enhance scalability, for future minigames.
- Documented audio DSP architecture of the codebase, which was used for new senior engineers joining the team.

Maintain Altitude - Internship (JULY 2024 - SEPTEMBER 2024)

- Created an importing program to process all audio stems, checking for mono compatibility, and highest frequencies to compress using Nyquist theorem. Saving large amounts of space for users.
- Worked independently, receiving an offer for full-time employment on graduation.

Skills

- Programming Languages: C, C++, C#, JS, Python, Max MSP, HTML, CSS
- Platforms: Git, Zephyr, STM32 IDE, EasyEda, Autodesk Fusion, Unity, Unity Version Control
- Electrical Engineering: Multimeter, Oscilloscope, Soldering, PCB design, Circuit design, Datasheets
- Other: Debian Server Maintenance with Docker and VM

Personal Projects

Polyrhythmic Midi Clock Sequencer (NOVEMBER 2025 - APRIL 2026)

- Custom STM32G0B1 PCB device built using Zephyr RTOS with a custom board file using state machine logic, ST-LINK and Serial Debugging ports and custom zephyr board file.
- Built drivers for independent multi-instance MIDI clocks, custom drivers for SSD1306 display, interrupt driven rotary encoder and switches on the finalised PCB.

ESP32 Bus Stop Fetcher (MAY 2026)

- Wireless IoT device, programmed in Arduino while utilizing FreeRTOS for improved system responsiveness during JSON fetching, retrieving information from the TFL API.

Ai Body Shape Envelope Generator Installation (FEBRUARY 2025)

- Use of websockets and JSON to communicate between a local server and Max MSP, interpreting and processing the data to draw an audio envelope for ambient music in snapshot intervals using the body shape.

Education & Other Skills

- **1st in Electronic Music Computing & Technology BSc (2025)** University of London, Goldsmiths
- **Experience in merchandising, video editing, design, marketing and social media** as a successful DJ and music producer. Performed in the UK and internationally.
- **Studying for Mandarin HSK Level 1**