

# Yijun Hu

Computer Science MEng | University of Warwick

✉ [me@yijun.hu](mailto:me@yijun.hu) 🏠 [Project Site](#)

📍 Nottingham, United Kingdom

I am a fourth year student at the University of Warwick, studying for an MEng in Computer Science. I am hard working, and enjoy problem solving and challenges, such as academic competitions like the UKMT Maths challenge, both alone and in teams. I have the skills to work with and guide others, as well as a strong ability in logical thinking, problem solving, and an ability to adapt to new situations and learn quickly. My interests range in topics from artificial intelligence to computer graphics and typographic design.

Originally hailing from China, I speak both English and Mandarin Chinese fluently. I am looking for opportunities to further my experience with machine learning, algorithm design and software development.

## Experience

**Graduate Teaching Assistant**, University of Warwick, Coventry, UK 2023-2024  
Leading first year undergraduate labs, in modules such as Computer Architecture and Functional Programming.

**AI Engineer**, Yushan (Usense) Technologies, Shanghai, China 2023  
Developing a backend flask API for AI features, e.g. Table boundary drawing and recognition, face comparison, ID card OCR, VAT receipt OCR. Working with machine learning and computer vision. Worked extensively with the learning framework PaddlePaddle, as well as OpenCV.

**Private Tutor. Freelance**, Nottingham and Coventry, UK 2019-2023  
Tutoring primarily Maths, Chemistry, Computer Science, programming (Python, Java), at levels from KS3 to University.

## Education

**Currently Studying: MEng Computer Science**, University of Warwick, Coventry 2020-Present  
(Integrated Masters) Average grade: 1st.

**A\* A\* A\* A\* in A Level**, George Spencer Academy, Nottingham, UK 2020  
In Maths, Further Maths, Computer Science and Chemistry.

**10 GCSEs (including 6 Grade 9s)**, George Spencer Academy, Nottingham, UK 2018  
Grade 9s include English Language, Mathematics, and all Sciences. Total list of grades: 9 9 9 9 9 9 A\* 8 8 6.

## Projects

**Using Optical Character Recognition to Identify Ancient Seal Script Chinese** Python 2023-2024  
MEng group project, working with computer vision and deep learning methods to perform optical character recognition, including eventual integration into an android application.

**Investigating AI Techniques for Generating Chinese Calligraphy** Python 2022-2023  
*First class*. Third year project, investigating image generation with CycleGANs for Chinese calligraphy style transfer.

**Packet Sniffer C** 2021  
A small second year project that analysed network packets for common attack signs, implemented using thread-pool multithreading.

**Language Parser** Java + JavaCC 2021  
A second year project which used the JavaCC language library to parse, interpret and execute a small restricted programming language.

**Mentoring Platform** Java 2021  
A group software engineering project where we built a prototype platform for mentoring, to be used internally in a company. This was done in Spring with a React front-end.

**Waffles** Java 2020  
A first year project about designing optimised algorithms for a java-based web server of restaurant reviews.

**Guqin Notation Font** 2021-present  
A font to write ancient chinese musical notation for the Chinese Zither (Guqin)  
A more detailed list can be found on my projects site.

## Courses Taken

<b>CS50 Artificial Intelligence in Python</b> , Harvard University, Online	2020
<b>Machine Learning A-Z</b> , Kirill Eremenko and Hadelin du Ponteves, Udemy, Online	2018

## Languages

**English, Mandarin Chinese:** Native proficiency

## Programming Languages

**Python** + Numpy, Pandas, Tensorflow, PyTorch, OpenCV, Scikit-learn and related data science libraries.  
**Java.**

With further knowledge in **HTML/CSS/JS, L<sup>A</sup>T<sub>E</sub>X, C, Haskell, C++**

## Personal interests

I enjoy hobbies in the arts, particularly traditional Chinese arts such as calligraphy and carving seal stones. I also have a particular interest in typography and design, and generally in all things visual. I am also particularly fond of interesting, niche (and perhaps esoteric) concepts in the various fields I'm familiar with, and am always happy to delve into new rabbit holes.

---

*I am a British Citizen with right to work in the UK*