

JIACHENG WU

(+852) 6099-8492 ◇ jwudm@connect.ust.hk

GF No.130, Tai Po Tsai Village, Clear Water Bay Road, Sai Kung, New Territories, Hong Kong

EDUCATION

Hong Kong University of Science and Technology *Sept. 2022 - Now*
MSc in Electronic Engineering, School of Electronic and Computer Engineering
CGA: 3.8
TGA: 3.8

The Chinese University of Hong Kong, Shenzhen *Sept. 2018 - May 2022*
B.ENG. in Electronic Information Engineering, School of Science and Engineering
Major GPA: 3.2/4.0
Cumulative GPA: 3.2/4.0
Languages: English (Advanced), Mandarin Chinese (Native)
Honours: Bachelor of Engineering with Honour, Second Class Upper Division; Computer Association Scholarship; Third prize on World Drone Championship Campus Tour

RESEARCH EXPERIENCE

Develop An On-bike Posture Recognition Model for Road Cycling based on Computer Vision *Sept. - Nov. 2022*
Research Assistant *HKUST*

- **Instructor: Prof. ZHANG, Xin**
- Learned deep learning and other related knowledge from scratch.
- Independently investigated papers and codes to finalize the database and model used.
- Implemented different models to recognize cyclist posture in real-time by the depth camera and get the data of orthographic projection area.
- Realized the function of recognizing the athlete's gesture and feedback in real time.

Develop Humanoid Robot Project *May - July 2021*
Research Assistant *CUHKSZ*

- **Instructor: Prof. ZHU, Jian**
- Helped implement and adjust the parameters of the eyes applied in the humanoid robot.
- Be Responsible for the code development of the eyes so that they can recognize and track faces automatically.

Robotic Mecanum Wheel Trolley Project *Jan. - May 2021*
Code Writer & Assembler, Student Robotic Association in RIM Lab *CUHKSZ*

- **Instructor: Prof. Sun, Zhenglong**
- Assembled the trolley with teammates and wrote the code to make the trolley automatically recognize the specific color blocks and grab them to a particular place.

Deep Learning-Based Model-Free Source Localization Project *Sept. 2020 - Mar. 2021*
Research Assistant *CUHKSZ*

- **Instructor: Prof. CHEN, Junting**
- Integrated papers to get the Heatmap method to solve the localization problem.
- Generated heatmap samples to create the dataset to overcome the problem of the model-free outdoor sources.

- Applied the CNN model to the heatmap problem and successfully located the illegal radio stations in the urban environment with the received radio signal strength through machine learning.

HANDS-ON EXPERIENCE

Electronic Circuit Design Projects

Sept. - Dec. 2019

Project Leader, Electronic Circuit Design Laboratory (A-)

CUHKSZ

· Instructor: Prof. Sun Zhenglong

- Used software to design circuits and implement circuit on the board to solve the certain problems.
- Measured and verified the results to learn the knowledge learnt from the textbook.

TECHNICAL STRENGTHS

Coding

Python, MATLAB, C++, Julia, Java

Machine Learning

PyTorch, TensorFlow

Integrating and Writing

LaTeX

Circuit Design and MCU Programming

STM32F103, ARDUINO UNO, FPGA