

# Tianyuan(Alex) Du | Résumé

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## Education

### Bachelor of Science, Computer Science and Statistics (Double Majors)

University of Michigan, Ann Arbor

2022/01 – 2024/05(expected)

GPA: 3.80/4.00

Courses: Autonomous Robotics, Computer Vision, Data Mining, Human-Centric ML, Computer Organization, Data Structure, Combinatorics, Theoretical Statistics

Thesis: Predicting Song Popularity using Affective Programming

### Computer Engineering and Business Management (Dual Degree Program)

Hong Kong University of Science and Technology (HKUST)

2020/09 – 2021/12

Courses: Random Process, Signals and Systems, Multivariable Calculus, Matrix Algebra, Case Analysis

## Experiences

### Interactive Sensing & Computing Lab, University of Michigan, Ann Arbor, US

Research Assistant

2022/05 – 2023/10

Under guidance of Professor Alanson Sample and graduate student Yang-Hsi Su, worked on a novel system for indoor sensing with Bluetooth Low Energy antenna array. Built a 3-dimensional localization pipeline based on low cost switching antenna array, designed experiments to evaluate its performance. Submitted the work to IEEE WCNC 2024 as **first author**.

### Hong Kong University of Science and Technology, Hong Kong S.A.R.

Undergraduate Research Opportunity (UROP)

2021/09 – 2022/02

Under guidance of Professor Kevin Chau from HKUST, worked on a paper for improving speech intelligibility of hearing aid devices. Conducted experiments to evaluate a novel method proposed in the paper.

### Applied Sci & Tech Research Institute, Hong Kong S.A.R.

Engineer Intern

2021/06 – 2021/08

Worked in Communication Division of Network Software Group, focusing on automated-driving vehicles to develop a system that could assist vehicles to park automatically. Developed an end-to-end automatic camera calibration pipeline with a senior engineer. Highly recognized by the group management team, and the work was presented to the Hong Kong Government.

## Awards

**2022-2023:** University Honor. Awarded by University of Michigan for academic excellence.

**2021:** Dean's List. Awarded by Hong Kong University of Science and Technology for academic excellence.

## Computer skills

**Languages:** C++, C, Python, Java, Javascript, R, SQL

**Expertise:** Machine Learning, Computer Vision, Signal Processing, Backend Development

## Languages

Chinese(Native), English(Fluent)

## Extracurriculars

**University of Michigan Triathlon Club:** Active member. Finisher of USAT Michigan State Championship and USA Collegiate National Championship.