Haotao (Eric) Lai

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Education Background

Concordia University (Montreal, Canada) 2016.09 ~ now

Degree: Master in Applied Computer Science (expected) GPA: N/A

Guangzhou University (Guangzhou, China) 2012.09 ~ 2016.06

Degree: Bachelor in Engineering GPA: 80%

Professional Skill

- programming language: Java, JavaScript, C, Python (familiarization decreasing order)
- English proficiency: IELTS 6.5 (no band below 6.0)
- Hardware development: STM32, AVR, Arduino, 80C51

Academic Experience

A kind of weeding robot based on computer vision 2016.03 ~ 2016.06

- Won the outstanding graduation project award (rank: 2 / 200)
- Independently developed the whole system contains: Android, VB.net, Halcon, Network communication

Internet express system 2015.01 ~ 2016.06

- Received 10,000RMB funding and a patent authorization
- Team leader of the whole project
- Created intelligence-based interactive system (both client and server)
- Implemented communication between android and STM32 as the control unit

Obstacle avoidance remote control robot 2015.09 ~ 2016.06

- Created using Arduino and Visual Basic
- Independently wrote the libraries using Arduino
- Used three casters for implementing moving system
- Design obstacle avoidance algorithm

- Using RS485 communication protocol to organize the sensor network
- Using Visual Basic for master computer's UI and control system

Special projects for blind and disable children **2014.09 ~ 2015.06**

Projects funded by Guangzhou Education Bureau

Project 1: Entertainment based system (dancing mat) for blind children

- Developed (as 2nd author) using STM32, SD card, I2C communication protocol and DMA
- Through investigative research done at the Guangzhou Blind Children School to better learn how to design communication for children's needs

Project 2: Disability assistant page reader

- Applied mechanical engineering design as 1st author for the linkage, and fabrication of the synchronous belt pulley and the motor

Forklift truck system **2013.09 ~ 2014.06**

- Developed (as 1st author) using Arduino, Bluetooth, android, and 3D printer
- Received a 2nd place award in school project competition and a patent authorization

Awards

- Guangzhou University outstanding graduation project award (2016)
- Guangzhou University the 2nd place scholarship (2016)
- Guangzhou University the 3rd place scholarship (2015)
- Guangzhou University Lab Competitions (1st and 2nd place in 2013 and 2014)
- University's Science and Technology Innovation Contest (2nd place in 2013)