Yutian Chen

1841 Shirley Ln, Apt C2, Ann Arbor, MI 48105   Tel: (734) 846-1747   Email: cytian@umich.edu

Objective

Graduate student working towards a M.S. degree in Electrical and Computer Engineering seeking an internship position to apply my algorithm knowledge and programming skills at your company.

Education

University of Michigan, Ann Arbor, MI   Sept. 2017 to Apr. 2019
Master of Science in Electrical and Computer Engineering   GPA: 4.0/4.3
Relevant courses: Probability and Random Processing, Parallel Computing, Computer Vision

University of Michigan, Ann Arbor, MI   Sept. 2015 to Apr. 2017
Bachelor of Science in Computer Engineering   GPA: 3.9/4.0
Relevant courses: Data Structure and Algorithms, Autonomous Robotics, Machine Learning

Shanghai Jiao Tong University, Shanghai, China   Sept. 2013 to Aug. 2015
Bachelor of Science in Electrical and Computer Engineering   Major GPA: 3.4/4.0

Work Experience

Line Chart Viewer, **Rtec Instrument**, *individual project*   June. 2016 to Aug. 2016

- Designed a Windows application GUI with **WPF(C#)** in MVVM pattern for the customers to plot the data in line charts.
- Implemented the functionality of multiple chart display, data cropping and data filtering.
- Optimize the capability and speed of the viewer to plot over 1,000,000 points in 2 seconds.

Project Experience

Famous People Search, *group project in Shanghai Jiao Tong University*   Jun. 2017 to Aug. 2017

- Developed a generalized web crawler in **Python** to collect images of famous people together with names.
- Applied NLP and face detection technique to extract Chinese names and link them to the corresponding images in the web page.
- Optimized the efficiency to 1.5 seconds per page in average and optimized the accuracy to 70% in our test.

BotLab Autonomous Navigation, *group project of Autonomous Robotics Course*   Jan. 2017 to Mar. 2017

- Led a team of four to develop a SLAM algorithm in **C++** for the Maebot to explore and navigate autonomously in a maze.
- Distributed the work to every individual and gathered them together every week to test and improve the performance of the Maebot.
- Got 1st place in the competition among all the 12 teams to traverse the perimeter of a square and 2nd place in the final challenge to explore and escape from a maze.

MIDI Controller, *group project of Microprocessor System Design Course*   Oct. 2016 to Nov. 2016

- Designed a MIDI controller with a pair of wireless gloves, a TFT touchscreen, and an 8x8 LED button pad, which allows users to create background music using the touchscreen and button pad and play real time music with the glove at the same time.
- Implemented API library for the LED button pad control, setup the communication between base console and gloves through Xbee and integrated all components to generate the MIDI message and shortened the delay of real time playing to around 40ms.

Programming Skills

Language: C++, Python, C, C#, JavaScript, HTML, R

System and Application: Windows, Linux, Visial Studio, MySQL