

# Zhaobo Ding

WatID:20700226 • Phone:(519)-781-6700  
• Page:dingzhaobo.net • Email:ding.zb@yahoo.com

## EDUCATION

### UNIVERSITY OF WATERLOO

•2B COMPUTER SCIENCE

### UNIVERSITY OF WATERLOO

•2B STATISTICS

- Expected graduation time: 2020
- GPA for core courses: 3.9

## LINKS

### GITHUB:

MashedPotatoDing

### LINKEDIN:

Zhaobo Ding

### PERSONAL PAGE:

dingzhaobo.net

## SKILLS

### PROGRAMMING

- C • C++ • Java • Perl
- Python • Shell

### WEB DEVELOPMENT

- HTML • CSS • JavaScript
- Node.js

### TECHNOLOGY

- Matlab • AWS • TensorFlow
- Octave • Git • DialogFlow

### DATABASE

- SQL • MongoDB

## AWARDS

### UNIVERSITY (2017)

- Term Dean's Honors List of Mathematics
- University of Waterloo President's Scholarship

### HIGH SCHOOL

- First Prize in Senior National Olympiad in Informatics in China (2015 & 2016)
- First Prize in Junior National Olympiad in Informatics in China (2012 & 2013)
- First Prize in Senior National Physical Competition (2016)

## EXPERIENCE

### INTEGRATED DEVICE TECHNOLOGY | ALGORITHM ENGINEER

January 2018 - April 2018 | Waterloo, Ontario, Canada

- Created and managed the first two versions of pre-configured AMI on AWS EC2 virtual Linux system to build the FPGA environment for the software team.
- Implemented Shell, Python and Perl scripts for data analyzing.
- Earned experience in developing by C and C++ while working with R11F team.

### XINCHUANG | QUALITY ASSURANCE

September 2016 - December 2016 | Nanjing, Jiangsu, China

- Investigated customer complaints.
- Collected and compiled statistical quality data.
- Analyzed the data and areas for improvement in the quality system.

### NANJING UNIVERSITY | EXPERIMENTER

July 2015 - August 2015 | Nanjing, Jiangsu, China

- Used Matlab and Python Script for experiment data analysis.
- Earned research experience while performing physical experiments and analyzing experimental data with professors and other experimenters.

## PROJECTS

### SNAKE GAME AI BOT

- An AI bot based on neural network, which can smartly play the snake game to get a high score like humans.
- Used TensorFlow and TFLearn library in Python for machine learning and Pygame library for graphical user interface.
- The snake game itself is an object-oriented project.

### UW SCHEDULE

- A web application that helps University of Waterloo students schedule their courses by providing the name of courses they hope to take.
- Varied kinds of filters are provided to users.

### ALYSSA

- Alyssa is the name of my AI talking robot who can talk and make an introduction for me to users.
- The sever is set by Node.js to process requests and replies.
- Used Google DialogFlow for machine learning and natural language processing.

### JOBOCOIN

- My self-configured cryptocurrency based on CryptoNoteCoin and compiled on AWS instance.
- Totally supplies  $2^{64}$  coins and the expected difficulty target is 150 seconds per node.

### BAMBOO ALBUM (HACKATHON TEAMWORK)

- An online album adding tags for users' photos automatically to help users to search for their photos by tags.
- Developed based on MongoDB, Express, Angular, Node.js as well as Microsoft Computer Vision API.