

Qiuyang, Zhang

Email: zhangcharlie@outlook.com Mobile: 984-215-8416

EDUCATION

Carnegie Mellon University

Spring 2023

- M.S. in Software Engineering

University Of North Carolina at Chapel-Hill

May 2022

- B.S. in Computer Science and Statistics (GPA:3.92/4.00)
- Honors: UNC Dean's List Fall 2018 - Spring 2022

SKILLS

Programming Languages: Python, Java, C, Shell, R, Swift, SQL, Javascript

Computer Vision Framework: Pytorch, Keras, and OpenCV.

Full Stack Skills: JavaScript, HTML5, CSS, AJAX, React, jQuery, NodeJS, Express.js, MongoDB, and MySQL

RELEVANT EXPERIENCE

Member, UNC Graphics & Virtual Reality Group at UNC

02/2021-Present

- Trained and finetuned ResNet body-segmentation model on human body images to perform human body segmentation task and assist a graduate student with the 3D body reconstruction project.
- Did annotation and augmentation on the dataset to refine the neural network models

Backend Intern, Gridsum Technology Co., Ltd., Shenzhen, China

05/2021-07/2021

- Used Java, MyBatis, and MySQL to build and test the backend for several projects, such as the Customer Database Platform (CDP) project and the FineReport product
- Communicated with frontend colleagues about the input and output of each method.

Member, Biomedical Research Imaging Center IDEA Lab at UNC

02/2020-08/2020

- Trained Convolutional Neural Networks (CNN) on Alzheimer's Disease Neuroimaging Initiative (ADNI) datasets to do three-way image classification.
- Used techniques such as transfer learning and attention mechanisms and attempted to identify which brain regions can be used as indicators of Alzheimer's Disease.

Natural Language Processing Lab at UNC

01/2020-05/2020

- Collaborated with a graduate student in the lab and worked on the Review Generation project.
- Implemented sentiment analysis and aspect analysis over every sentence in each customer's review using Python and some NLP packages.
- Compare with prior probability of that aspect to see if there are noticeable patterns in aspect shift.

Instructional Assistant of "Data Analysis" course at UNC

01/2020-05/2020

- Grade students' assignments done in R and explain why points are taken off to help students better understand the coursework.

CLASS PROJECTS

COMP 590-153 Computer Vision projects

01/2020-05/2020

- Worked on basic image processing projects such as image resizing and image blurring/sharpening using Python and OpenCV.
- Implemented application-oriented projects such as edge detection, corner detection, feature matching, panorama stitching, and convolutional neural network using Python and OpenCV.

COMP 426 Web Development projects

08/2020-11/2020

- Used ReactJS as the frontend and MongoDB and NodeJS as the backend to build a Covid19-tracker app based on JavaScript; Used the covid19 API as a data source and provided the latest number of cases and deaths in almost every country; Deployed the app on Heroku.
- Built the frontend of a mini-Twitter app using JavaScript and jQuery to achieve some functionalities, such as "login", "posting", "retweet", "reply", and "likes", etc.