

Kaiyue TAO

(+86)183-5604-8631 | tky0329@mail.ustc.edu.cn | <https://kaiyuetao.github.io/>
West Campus, USTC, Huangshan Road #443, Shushan District, Hefei, Anhui, P. R. China

Education

University of Science and Technology of China

Hefei, China

B.E. in Computer Science and Technology

Expected 07/2021

- GPA: 85.24/100 (3.45/4.3)
- Core Courses and highlight: Operating System (93), Data Structures (93), Computer Architecture (92), Computer Networks (90), C Language Programming II (99), Computer Graphics and Image Processing (91)

Experiences

University of Washington

Seattle, USA

Advanced Medical Imaging Program (remote), Vascular Imaging Lab

07/2020 – 09/2020

- Designed a Metric-learning network for Magnetic Resonance Vascular imaging analysis on OAI dataset
- Applied episodic training method to overcome the problem of overfitting caused by highly-limited annotations
- Proposed a Meta-learning based, automatic, and self-improving workflow to detect potential vascular diseases on thousand times larger unchecked samples
- Abstract submitted to ISMRM2021

ByteDance Inc.

Shenzhen, China

Computer Vision Intern, AI Lab & Product RD and Infrastructure Dept.

06/2020 – 09/2020

- Developed an auto intelligent video-editing pipeline based on Action Recognition/Video Summarization/OCR
- Utilized flexible layered code structure strategy to overcome highly-variated game logic and video complexity
- The robust pipeline realized high-throughput, labor-free, ultrafast fancy editing of crude screen recording, applicated in 23+ game trailer generation businesses
- Developed a visualization tool for video feature analysis, widely used in Game AI group

University of Science and Technology of China

Hefei, China

Research Assistant, Knowledge and Data Engineering (KDE) Lab

10/2019 – Present

- Developed a general labeling tool, efficiently applied for the construction of an image-captcha dataset (reCaptcha v2)
- Applied Graph Neural Network (GNN) structure to Multi-label Image Classification task on the constructed dataset
- Improved the accuracy up to 95% (10% higher than classic CNN models)

University of Tokyo

Tokyo, Japan

Summer Intern, Lab of Functional Analysis in silico (FAiS)

07/2019 – 08/2019

- Visualized raw DNA Hi-C data into heatmap, analyzed its relationship with gene expression level
- Designed a super-resolution network with Auto-Encoder structure for DNA Hi-C data enhancement

International Genetically Engineered Machine Competition (iGEM 2018)

Jamboree in Boston, USA

Core member of Team-USTC (Evaluation: A+)

11/2017 – 10/2018

- Co-designed synthesis biology route for tobacco waste functionalization
- Art design and Team Wiki Page development (<http://2018.igem.org/Team:USTC>)

Selected Awards and Honors

International Genetically Engineered Machine Competition, Bronze medal

10/2018

Outstanding Student Scholarship, Silver/Bronze

10/2018, 2020

Shitsan Pai Elite Scholarship (Category A, top 2%)

10/2016

Activities

Teaching Assistant of the course *Syllabus of Digital Logic Lab*

10/2020 – 12/2020

iGEM Asian Conference (Taiwan) & Jamboree (Boston)

08/2018

Vice Minister of Propaganda Department of Student Union in School of Life Science

09/2017 – 06/2018