Dinghow Yang | Curriculum Vitae

School of Software Engineering,Tongji University
4800 Cao'an Road,Shanghai,China

dinghowyang@gmail.com github.com/Dinghow +86 18916171995

EDUCATION

Tongji University **Shanghai,China**
B.Eng. in Software Engineering *Expected Graduation: June 2020*
GPA: 4.58/5.0 (90.8/100), Top 8%

Relevant Coursework: Calculus(A), Discrete Mathematics(A), Linear Algebra(A), Probability and Statistics(A), Combinatorics(A), Object-Oriented Programming(A), Data Structures and Algorithms(A), Operating Systems(A), Software Engineering(A), Compute Network(A), Databases(A), Computer Architecture(A), Digital Image Processing(A), Computer Graphics(A), Computer Vision(A)
Self-study Coursework: Machine Learning, Google Machine Leraning Crash Course, Udacity Deep Learning, CS231n

EXPERIENCE

ilab **Tongji Univ, Shanghai**
Research Assistant *Aug. 2018 - Present*
- Focus on computer vision and medical image analysis
- Under the guidance of Prof.Jianwei Lu and Dr.Guokai Zhang

Graphic image research center **Tongji Univ, Shanghai**
Research Assistant *Oct. 2018 - Present*
- Focus onaugmented reality and webAR
- Under the guidance of Prof.Jinyuan Jia

SAP **SAP,Shanghai**
Internship *Jul. 2018 - Sep. 2018*
- I took part in the internship of SAP VT project.

Microsoft Student Summer Camp **Microsoft, Beijing**
Participant *Aug. 2018*
- I was a participant of Microsoft Student Summer Camp 2018 at MSRA

Microsoft Student Club **Tongji Univ,Shanghai**
Chairman *Jun. 2018 - Present*
- Responsible for organizing club,managing every aspect of the club.

Huawei Student Club **Tongji Univ,Shanghai**
Vice minister of technology *Apr. 2017 - Mar. 2018*
- Responsible for teaching club members to learn some new skills,such as Java,Android.

HONORS & AWARDS

- 17' National second Prize in China Mathematical Contest in Modeling, Ministry of Education(Top 6.5%
- 17' First-class scholarship, Tongji University(Top 5%)
- 17' Social activity scholarship, Tongji University(Top 5%)
- 17' Elite student, Tongji University(Top 5%)
- 18' Ali Tianchi Big Data Competetion ICPR MTWI 2018 Word Detection 101/1424, ICPR2018(TOP 7%)
- 18' Elite Leader of Microsoft Student Club, MSRA
- 18' Microsoft Practice Space Outstanding Winner, MSRA(10 of 119)
- 18' Shanghai First Prize in China Mathematical Contest in Modeling, Ministry of Education(Top 10%
- 18' First-class scholarship, Tongji University(Top 5%)
- 18' Social activity scholarship, Tongji University(Top 5%)
- 18' Elite student,Tongji University(Top 5%)

PROJECTS

OCR on Video *Dec. 2017 – Mar. 2018*

Advisor: Researcher Chao Chen, Researcher Alan Ip, MSRA

- A project of Microsoft Student Club Practice Space, focusing on extracting video caption.
- Got Outstanding winner prize(10 of 119 teams)
- Based on top-hat transform, and using perceptive hash algorithm for caption deduplication, our algorithm achieving more than 390 frames per second, and the F1 score is higher than 95%.

Word Detection *Apr. 2018 – May. 2018*

- A project for Ali Tianchi Big Data Competetion ICPR MTWI 2018 Word Detection, focusing on images processing and text localization.
- Rank 101 of 1424 teams.
- Mainly used CTPN, detected the text from four directions.

Prostatic Cancer Segmentation *Oct. 2018 – Apr. 2019*

Advisor: Prof.Jianwei Lu, Dr.Guokai Zhang, ilab, Tongji Univ

- A project about semantic segmentation of prostatic cancer, focusing on predicting the cancer region and predicting the best point for prostate puncture.
- Used Mask-RCNN and U-net as the backbone network, and added Grad-CAM to generate the probability image.
- Basked on the MRI prostate cancer dataset, used 3D network architecture, could predict the volume of cancer region.

PUBLICATIONS

- Yuchen Zhong*, Dinghao Yang* and Qingjiang Shi. *Automatic caption extraction and recognition for videos via top-hat transform and res-crnn.* submitted to IEEE ICIP 2019 (under review)**(* stands for equal first authors)**

TECHNICAL STRENGTH

- Programming Languages: Python, C/C++, C#, Matlab, Java, HTML/CSS, LaTeX
- Platforms: Windows, Linux, macOS
- Version Control: Git
- Packages&Tools: Tensorflow, Keras, PyTorch, Azure, OpenCV, NNI

ADDITIONAL

- I'm a founder of a commonweal organization,which focuses on education, and I've made several speeches in a senior high school
- Interest :Machine Learning,Deep learning,Computer vision(Now I'm learning them by myself and do related projects in our laboratory)