

Education

- 2014–2018 **B.Sc. at National Tsing-Hua University**, *Computer Science*, Hsinchu, Taiwan.
GPA: 3.61/4.30 (Overall), 3.72/4.30 (Major)
Ranking: 48/164 (~ top 30%)
Advisor: Shan-Hung Wu, Chun-Yi Lee, and Hwann-Tzong Chen

Experience

- 2017–2018 **Academia Sinica**, *Research Assistant*, Taipei, Taiwan.
Advisor: Wei-Yun Ma
- Long document comprehension and speed reading for machine.
- Automatic relation extraction.
- 2017–2018 **NTHU ElsaLab**, *Research Assistant*, Hsinchu, Taiwan.
Advisor: Chun-Yi Lee
- Real-time video segmentation on embedding system.
- Navigation in 360 street view.
- 2017–2018 **Umbo Computer Vision Inc.**, *Research Collaboration*, Taipei, Taiwan.
Advisor: Hwann-Tzong Chen
- Real-time human pose estimation and motion deblurring for detection enhancement.
- Video summarization.
- Summer 2017 **Academia Sinica**, *Research Intern*, Taipei, Taiwan.
Advisor: Wei-Yun Ma
- Goal-driven dialogue system for trip itinerary recommendation.
- 2016–2017 **Caringloop Inc.**, *iOS Software Engineer Intern*, Taipei, Taiwan.
- iOS front-end development.
- 2015–2016 **8888Play Inc.**, *iOS Software Engineer Intern*, Hsinchu, Taiwan.
- iOS algorithm development.
- Real-time compression and streaming for multimedia.

Publications

- 2018 **Speed Reading: Learning to Read ForBackward via Shuttle.**
Tsu-Jui Fu and Wei-Yun Ma
Conference on Empirical Methods in Natural Language Processing (**EMNLP**), 2018 (long paper)
- 2018 **Attentive and Adversarial Learning for Video Summarization.**
Tsu-Jui Fu and Hwann-Tzong Chen
IEEE Winter Conference on Applications of Computer Vision (**WACV**), 2019
- 2018 **Dynamic Video Segmentation Network.**
Yu-Syuan Xu, **Tsu-Jui Fu**, Hsuan-Kung Yang, and Chun-Yi Lee
IEEE Conference on Computer Vision and Pattern Recognition (**CVPR**), 2018
- 2018 **Region-Semantics Preserving Image Synthesis.**
Kang-Jun Liu, **Tsu-Jui Fu**, and Shan-Hung Wu
Asian Conference on Computer Vision (**ACCV**), 2018
- 2018 **Diversity-Driven Exploration Strategy for Deep Reinforcement Learning.**
Zhang-Wei Hong, Tzu-Yun Shann, Shih-Yang Su, Yi-Hsiang Chang, **Tsu-Jui Fu**, and Chun-Yi Lee
Conference on Neural Information Processing Systems (**NIPS**), 2018
- 2018 **Visual Relationship Prediction via Label Clustering and Incorporation of Depth.**
Hsuan-Kung Yang, An-Chieh Cheng, Kuan-Wei Ho, **Tsu-Jui Fu**, and Chun-Yi Lee
European Conference on Computer Vision (**ECCV**), 2018 (workshop)

- 2018 **GraphRel: Relation Extraction via Graph Convolutional Network.**
Tsu-Jui Fu, Peng-Hsuan Li, and Wei-Yun Ma
 Submitted
- 2018 **Dialogue-based Diverse Travel Itinerary Recommendation System via Path Sampling.**
Tsu-Jui Fu, Yu-Han Chen, Huan-Cheng Chang, and Wei-Yun Ma
 Submitted
- 2018 **Embedding Cluster for Accelerating Semantic Video Segmentation.**
Tsu-Jui Fu*, Hsuan-Kung Yang*, Kuan-Wei Ho, Po-Han Chiang and Chun-Yi Lee
 Submitted
- 2018 **Adversarial Exploration Strategy for Self-Supervised Imitation Learning.**
 Zhang-Wei Hong, **Tsu-Jui Fu**, Tzu-Yun Shann, Yi-Hsiang Chang, Dong-Ying Kuo, and Chun-Yi Lee
 Submitted

Selected Projects

- Fall 2017 **Native Ads.**
 An ad matching and generation system to match commodity and blog post along with sentences generated for sale promotion.
 - Selected as the best popularity award of senior project contest.
- Fall 2017 **Pose Estimation with Human Segmentation Enhancement.**
 Joint learning of pose estimation and human segmentation to give bottom-up pose model a body structure concept, reducing false-positive prediction.
 - Selected as the best final project of EE648500 Computer Vision.
- Summer 2017 **Travel Itinerary Recommendation Chatbot.**
 A dialogue system which converses with user, extracts their preference and recommends a tailor-made travel itinerary.
 - Selected as silver medal of PIXENET chatbot competition.
- Fall 2016 **Give Me a God Reply.**
 Automatic reply system on Dcard forum.
 - Selected as the judges' and best popularity award of senior project contest.
- Fall 2016 **To Turn, or Not to Turn?.**
 A system that predicts whether a car will turn and help flash the turn signal automatically, along with a diffuse notification algorithm via IoV.
 - 1st prize of 2016 Mei-Chu Hackathon.

Awards

- Summer 2018 **Second Place, Person In Context Challenge, ECCV 2018.**
 Awarded to team with excellent benchmark performance of PIC challenge
- Spring 2018 **Outstanding Students Conference Travel Grant, Foundation For The Advancement of Outstanding Scholarship (FAOS), Taiwan.**
 Providing travel grants to outstanding students to participate in international academic conferences
- Fall 2017 **Silver Medal, PIXNET Chatbot Competition, PIXENET Inc., Taiwan.**
 Awarded to team with excellent implementation and demo of chatbot
- 2016, 2017 **First Place, MeiChu Hackathon, National Chiao-Tung University.**
 Awarded to team with the best implementation and demo of hackathon
- 2016, 2017 **Judges' and Best Popularity Award, Senior Project Contest, National Tsing-Hua University.**
 Awarded to student with judges' award and the best popularity of project contest
- Fall 2015 **Third Place, Open Source Competition, National Tsing-Hua University.**
 Awarded to team with big contribution to open source project
- Fall 2014 **Presidential Award, Computer Science, National Tsing-Hua University.**
 Awarded to student with the top 5% GPA for that semester
- Fall 2013 **Third Place, Taipei High School Informatics Competition, Taipei.**
 Awarded to student in algorithm and data structure competition

Fall 2012 **First Place**, *Taipei High School Software Design Competition*, Taipei.
Awarded to student in algorithm and data structure competition

Teaching

Summer 2018 **Teaching Assistant**, *Vision and Learning Summer School*, National Tsing-Hua University.

Spring 2018 **Teaching Assistant**, *Nvidia Deep Learning Workshop*, National Central University.

Fall 2017 **Teaching Assistant**, *Deep Learning*, National Tsing-Hua University.

Fall 2017 **Teaching Assistant**, *Hardware Design and Lab*, National Tsing-Hua University.

Programming Skills

Tensorflow, PyTorch, Torch, Keras, C, C++, Python, Java, Swift, Objective-C, Android, HTML, CSS, JavaScript.