Qiucheng Wu

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Education

University of California, Santa Barbara, CA Ph.D. student in Computer Science Advisor: Prof. Shiyu Chang	2021 - Present
University of Michigan, MI M.S. in Computer Science and Engineering	2019 - 2021
University of Michigan, MI B.S. in Computer Science and Engineering	2017 - 2019
Shanghai Jiao Tong University, Shanghai, China B.S. in Electrical and Computer Engineering	2015 - 2019

Work Experience

Adobe, Research Intern Summer 2023 | Summer 2024 | Summer 2025

Advisor: Dr. Handong Zhao

Research Focus: MLLM Adaptation & Alignment, MLLM Agents, Controllable Vision Generation

Outcomes: ICCV 2025 (MLLM visual understanding), ICCV 2023 & CVPR 2023 (text control in diffusion)

Picsart, Research Intern Summer 2022

Advisor: Dr. Humphrey Shi

Research Focus: Controllable Image Generation

Outcomes: CPAL 2024, TIP 2023

Fitly, Machine Learning Engineer Intern 2019 - 2020

Selected Publications

‡ indicates authors with equal contributions.

- Qiucheng Wu, Handong Zhao, Michael Saxon, Trung Bui, William Yang Wang, Yang Zhang, and Shiyu Chang. "VSP: Diagnosing the Dual Challenges of Perception and Reasoning in Spatial Planning Tasks for MLLMs". ICCV, 2025
- 2. Qiucheng Wu[‡], Yifan Jiang[‡], Junru Wu[‡], Kai Wang, Gong Zhang, Humphrey Shi, Zhangyang Wang, and Shiyu Chang. "Decoding Micromotion in Low-dimensional Latent Spaces from StyleGAN". **CPAL**, **2024.**
- 3. Qiucheng Wu[‡], Yujian Liu[‡], Handong Zhao, Trung Bui, Zhe Lin, Yang Zhang, and Shiyu Chang. "Harnessing the spatial-temporal attention of diffusion models for high-fidelity text-to-image synthesis". ICCV, 2023.
- 4. Qiucheng Wu, Yujian Liu, Handong Zhao, Ajinkya Kale, Trung Bui, Tong Yu, Zhe Lin, Yang Zhang, and Shiyu Chang. "Uncovering the disentanglement capability in text-to-image diffusion models". CVPR, 2023.

- 5. **Qiucheng Wu**[‡], Yifan Jiang[‡], Junru Wu[‡], Victor Kulikov, Vidit Goel, Nikita Orlov, Humphrey Shi, Zhangyang Wang, and Shiyu Chang. "Broad Spectrum Image Deblurring via An Adaptive Super-Network". **TIP, 2023.**
- 6. Yimeng Zhang[‡], Akshay Karkal Kamath[‡], **Qiucheng Wu**[‡], Zhiwen Fan[‡], Wuyang Chen, Zhangyang Wang, Shiyu Chang, Sijia Liu, and Cong Hao. "Data-Model-Circuit Tri-Design for Ultra-Light Video Intelligence on Edge Devices". **ASP-DAC**, **2023**.
- 7. Wantong Li, **Qiucheng Wu**, Janak Sharda, Shiyu Chang, and Shimeng Yu. "Temporal Frame Filtering with Near-Pixel Compute for Autonomous Driving". **AICAS**, **2022**.
- 8. Yijie Guo, Qiucheng Wu, and Honglak Lee. "Learning action translator for meta reinforcement learning on sparse-reward tasks". AAAI, 2022.

Preprints

‡ indicates authors with equal contributions.

1. Xinyi Gao[‡], **Qiucheng Wu**[‡], Yang Zhang[‡], Xuechen Liu, Kaizhi Qian, Ying Xu, and Shiyu Chang. "A Hierarchical Probabilistic Framework for Incremental Knowledge Tracing in Classroom Settings". **Arxiv**.

Service

- Local organization chair, 2022 Southern California NLP Workshop (SoCalNLP)
- Reviewer, NeurIPS, ICML, ICCV, CVPR, TMLR

Teaching Experience

- CS165B: Machine Learning (TA, Fall 2021, Winter 2024, UCSB).
- EECS492: Intro to Artificial Intelligence (TA, Fall 2020, Winter 2021, UMich).
- Vv156: Applied Honors Calculus (TA, Fall 2016, UM-SJTU Joint Institute, SJTU).

Awards and Honors

2019	James B. Angell Scholar (UMich)
2019	Capstone Gold Prize (SJTU)
2018	MIDAS Data Science Symposium, Most Interesting Methodological Advances (UMich)
2016	Bosch Scholarship (SJTU)
2016	Academic Excellence Scholarship (SJTU)