Dingjie James Song

CONTACT Information

EDUCATION

The Chinese University of Hong Kong, Shenzhen, Dao Yuan Building 2001 Longxiang Blvd.
Longgang District, Shenzhen

GitHub Google Scholar

Master of Software Engineering, Nanjing University, Nanjing, China

June 2023

Email Home Page

Advisors: Dr. Xinyu Dai, Dr. Jidong Ge

GPA: 4.4/5.0

China

Bachelor of Software Engineering, Nanjing University, Nanjing, China

June 2021

Advisors: Dr. Xinyu Dai, Dr. Jidong Ge

GPA: 4.3/5.0

RESEARCH INTERESTS My research interests lie in the field of Natural Language Processing (NLP), with a particular focus on intelligent interactive systems and domain-specific large language models (LLMs). I am particularly interested in multimodal LLMs, with a recent emphasis on long-context multimodal models that aim to understand, generate, and interact within long contexts. Additionally, my research covers several other topics, including medical LLMs and multilingual LLMs. Prior to the emergence of LLMs, I had a strong interest in task-oriented dialogue systems.

SUBMITTED PUBLICATIONS

- 10. **Dingjie Song***, Sicheng Lai* (equal contribution), Shunian Chen, Lichao Sun, Benyou Wang. (2024). Both Text and Images Leaked! A Systematic Analysis of Multimodal LLM Data Contamination. [arXiv:2411.03823]. Preprint.
- 9. **Dingjie Song***, Xidong Wang* (equal contribution), Shunian Chen, Chen Zhang, Benyou Wang. (2024). *LongLLaVA: Scaling Multi-modal LLMs to 1000 Images Efficiently via Hybrid Architecture*. [arXiv:2409.02889]. *Preprint*.
- 8. **Dingjie Song**, Wenjun Wang, Shunian Chen, Xidong Wang, Michael Guan, Benyou Wang. (2024). Less is More: A Simple yet Effective Token Reduction Method for Efficient Multi-modal LLMs. [arXiv:2409.10994]. Preprint.
- 7. Wentao Ge, Shunian Chen, Guiming Hardy Chen, Zhihong Chen, Junying Chen, Shuo Yan, Chenghao Zhu, Ziyue Lin, Wenya Xie, Xinyi Zhang, Yichen Chai, Xiaoyu Liu, **Dingjie Song**, Xidong Wang, Anningzhe Gao, Zhiyi Zhang, Jianquan Li, Xiang Wan, Benyou Wang. (2023). MLLM-Bench: Evaluating Multimodal LLMs with Per-sample Criteria. [arXiv:2311.13951]. Preprint.

ACCEPTED PUBLICATIONS

- 6. **Dingjie Song**, Shunian Chen, Guiming Hardy Chen, Fei Yu, Xiang Wan, Benyou Wang. (2024). *MileBench: Benchmarking MLLMs in Long Context*. [arXiv:2404.18532] (COLM 2024).
- Junying Chen, Xidong Wang, Anningzhe Gao, Feng Jiang, Shunian Chen, Hongbo Zhang, Dingjie Song, Wenya Xie, Chuyi Kong, Jianquan Li, Xiang Wan, Haizhou Li, Benyou Wang. (2023). Huatuo GPT-II, One-stage Training for Medical Adaption of LLMs. [arXiv:2311.09774] (COLM 2024)
- Dingjie Song*, Xidong Wang*, Guiming Hardy Chen* (equal contribution), Zhiyi Zhang, Zhihong Chen, Qingying Xiao, Feng Jiang, Jianquan Li, Xiang Wan, Benyou Wang, Haizhou Li. (2024) CMB: A Comprehensive Medical Benchmark in Chinese. [arXiv:2308.08833] (NAACL main 2024).

- 3. Huang Huang*, Fei Yu*, Jianqing Zhu* (equal contribution), Xuening Sun, Hao Cheng, **Dingjie Song**, Zhihong Chen, Abdulmohsen Alharthi, Bang An, Juncai He, Ziche Liu, Zhiyi Zhang, Junying Chen, Jianquan Li, Benyou Wang, Lian Zhang, Ruoyu Sun, Xiang Wan, Haizhou Li, Jinchao Xu. (2024) *AceGPT*, *Localizing Large Language Models in Arabic*. [arXiv:2309.12053] (NAACL main 2024).
- 2. **Dingjie Song***, Pengfei Sun* (equal contribution), Yawen Ouyang, Zhen Wu, Xinyu Dai. (2023) Episode-based Prompt Learning for Any-shot Intent Detection. Springer (NLPCC 2023; Oral).
- 1. Pengfei Sun, Yawen Ouyang, **Dingjie Song**, Xinyu Dai. (2022) Self-Supervised Task Augmentation for Few-Shot Intent Detection. Springer (JCST, 2022, 37(3): 527-538).

RESEARCH EXPERIENCE

Research Intern, Squirrel AI

October 2024–Present

Mentor: Dr. Tianlong Xu and Dr. Qingsong Wen

Focus: Multimodal LLM and Math LLM.

Research Assistant, The Chinese University of Hong Kong, Shenzhen July 2023–September 2024

Mentor: Dr. Benyou Wang

Focus: Multimodal LLM, Medical LLM, and Multilingual LLM.

 ${\bf NLP\ Research\ Intern}, {\bf International\ Digital\ Economy\ Academy\ (IDEA)\ \bf July\ 2022-May\ 2023}$

Mentor: Dr. Jiaxing Zhang

Focus: In-context learning and Code LLM.

Graduate Student, NLP Group, Nanjing University

August 2021-June 2022

Advisor: Dr. Xinyu Dai

Focus: Low-resource spoken language understanding.

Honors and Awards Outstanding Graduate Student, Nanjing University

2023

Yingcai Scholarship, Nanjing University

2022

Renmin Scholarship (Peoples Scholarship), Nanjing University

2018-2021

Third Runner's Up in 15th Citi Cup Financial Innovation Application Competition, Citigroup 2019

Second Runner's Up in 2019 "Chain to Future" University Blockchain Technology Application Competition, CCF 2019

Outstanding Student Leader of the Communist Youth League, Nanjing University 2018–2019

SKILLS

Computer Skills: Proficient in Python, Java, JavaScript, SQL, HTML/CSS. Experience with PyTorch, DeepSpeed, Colossal-AI, FAISS, Elastic Search, Spark, Git, LATEX, ssh.

Natural languages: English, Mandarin, Cantonese.