

# Changzhi Sun

Bytedance AI Lab  
10th Floor, Building 24, Sanqi, Lvzhou Technology  
1999 N.Yishan Rd., Shanghai, China

Phone: (86)13918382480  
Email: [czsun.cs@gmail.com](mailto:czsun.cs@gmail.com)  
Homepage: <http://czsun.site>

## Research Interests

- Extracting structured data from free text.
- Explaining black-box model.
- Reasoning over structured data or free text.

## Education

- Ph.D. Compute Science, East China Normal University, 2019.
- B.S. Compute Science, Anhui Normal University, 2014.

## Publications

[\*: equal contribution]

### *Under Review*

- [1]. *NAIL: A Challenging Benchmark for Naïve Logical Reasoning*  
Xinbo Zhang\*, **Changzhi Sun\***, Yue Zhang, Lei Li and Hao Zhou.  
Long paper, submitted to TACL, rejected by ICLR 2022
- [2]. *Can Pre-trained Models Really Generate Single-Step Textual Entailment?*  
Liping Yuan, Xinbo Zhang, **Changzhi Sun**, Xiaoqing Zheng and Hao Zhou.  
Long paper, rejected by ACL 2022
- [3]. *Few Clean Instances Help Denoising Distant Supervision*  
Ziyin Huang, **Changzhi Sun**, Yijun Wang, Yuanbin Wu and Man Lan.  
Long paper, rejected by ACL 2022
- [4]. *Leveraging High-order Interactions for Unified Entity Relation Extraction*  
Yijun Wang\*, **Changzhi Sun\***, Yuanbin Wu, Zhao Zhou, Lei Li and Junchi Yan  
Full paper, rejected by IJCAI 2022, AACL 2022

*Proceedings*

- [1]. *E-KAR: A Benchmark for Rationalizing Natural Language Analogical Reasoning*  
Jiangjie Chen, Rui Xu, Ziquan Fu, Wei Shi, Zhongqiao Li, Xinbo Zhang, **Changzhi Sun**, Lei Li, Yanghua Xiao and Hao Zhou.  
Findings, ACL 2022
- [2]. *Logic-Regularized Reasoning for Interpretable Fact Verification*  
Jiangjie Chen, Qiaoben Bao, **Changzhi Sun**, Xinbo Zhang, Jiase Chen, Hao Zhou, Yanghua Xiao and Lei Li.  
Full paper, AAAI 2022
- [3]. *Learning Logic Rules for Document-Level Relation Extraction*  
Dongyu Ru, **Changzhi Sun**, Jiangtao Feng, Lin Qiu, Hao Zhou, Weinan Zhang, Yong Yu and Lei Li.  
Long paper, EMNLP 2021
- [4]. *Probabilistic Graph Reasoning for Natural Proof Generation*  
**Changzhi Sun\***, Xinbo Zhang\*, Jiangjie Chen, Chun Gan, Yuanbin Wu, Jiase Chen, Hao Zhou and Lei Li  
Findings, ACL 2021
- [5]. *UniRE: A Unified Label Space for Entity Relation Extraction*  
Yijun Wang\*, **Changzhi Sun\***, Yuanbin Wu, Zhao Zhou, Lei Li and Junchi Yan  
Long paper, ACL 2021
- [6]. *ENPAR: Enhancing Entity and Entity Pair Representations for Joint Entity Relation Extraction*  
Yijun Wang, **Changzhi Sun**, Yuanbin Wu, Zhao Zhou, Lei Li and Junchi Yan  
Long paper, EACL 2021
- [7]. *Is “hot pizza” Positive or Negative? Mining Target-aware Sentiment Lexicons*  
Jie Zhou, Yuanbin Wu, **Changzhi Sun** and Liang He  
Long paper, EACL 2021
- [8]. *Pre-training Entity Relation Encoder with Intra-span and Inter-span Information*  
Yijun Wang, **Changzhi Sun**, Yuanbin Wu, Junchi Yan, Peng Gao and Guotong Xie  
Long paper, EMNLP 2020
- [9]. *BiGCNN: Bidirectional Gated Convolutional Neural Network for Chinese Named Entity Recognition*  
Tianyang Zhao, Haoyan Liu, Qianhui Wu, **Changzhi Sun**, Dongdong Zhan and Zhoujun Li  
Full paper, DASFAA 2020
- [10]. *Joint Type Inference on Entities and Relations via Graph Convolutional Networks*  
**Changzhi Sun**, Yeyun Gong, Yuanbin Wu, Ming Gong, Daxin Jiang, Man Lan, Shiliang Sun and Nan Duan  
Long paper, ACL 2019
- [11]. *Distantly Supervised Entity Relation Extraction with Adapted Manual Annotations*  
**Changzhi Sun**, Yuanbin Wu  
Full paper, AAAI 2019

- [12]. *Extracting Entities and Relations with Joint Minimum Risk Training*  
**Changzhi Sun**, Yuanbin Wu, Man Lan, Shiliang Sun, Wenting Wang, Kuang-Chih Lee, and Kewen Wu  
Long paper, EMNLP 2018
- [13]. *Large-scale Opinion Relation Extraction with Distantly Supervised Neural Network*  
**Changzhi Sun**, Yuanbin Wu, Man Lan, Shiliang Sun and Qi Zhang  
Long paper, EACL 2017

## Experience

Bytedance *June. 2020 - Present*

Group: AI Lab  
Position: Researcher  
Host: Hao Zhou and Lei Li  
Topic: Deep Reasoning in NLP

East China Normal University *Sep. 2014 - Dec. 2019*

Group: Natural Language Processing Group  
Position: Ph.D candidate  
Supervisor: Yuanbin Wu and Shiliang Sun  
Thesis: Deep Learning for Joint Entity Relation Extraction

Microsoft Research Asia *Dec. 2018 - May. 2019*

Group: Natural Language Computing (NLC)  
Position: Intern  
Host: Yeyun Gong and Nan Duan

## Academic Activities

Conference PC member: ARR(ACL Rolling Review), NAACL(2021), AAAI(2022, 2021), ACL(2021, 2020), EMNLP(2021, 2020), COLING(2020).