

HuCLLM 2024

**The First Human-Centered Large Language Modeling  
Workshop**

**Proceedings of the Workshop**

August 15, 2024

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## Introduction

*A word’s meaning resides in the heart and soul of its “generator” - people. How do we include human (personal, social, cultural, situational) context, ethically, into LLMs – the base models of our NLP systems?*

Language modeling in the context of its source [author] and target [audience] can enable NLP systems to better understand human language. Advances in *human-centered NLP* have established the importance of modeling the human context holistically, including personal, social, cultural, and situational factors in NLP systems. Yet, our NLP systems have become heavily reliant on large language models that do not capture the human context.

Human language is highly dependent on the rich and complex human context such as (a) *who* is speaking, (b) to *whom*, (c) *where* (situation/environment) and (d) *when* (time and place). It is additionally moderated by the changing human states of being such as their mental and emotional states.

Current large language models can possibly simulate some form of human context given their large scale of parameters and pre-training data. However, they do not explicitly process language in the higher order structure of language – connecting documents to people, the “source” of the language.

Prior work has demonstrated the benefits of including the author’s information using LLMs for downstream NLP tasks. Recent research has also shown that LLMs can benefit from including additional author context in the LM pre-training task itself. Progress in the direction of merging the two successful parallels, i.e., human-centered NLP and LLMs, drives us toward creating a vision of human-centered LLMs for the future of NLP in the era of LLMs.

Human-centered large language modeling has the potential to bring promising improvements in human-centric applications through multiple domains such as healthcare, education, consumerism, etc. Simultaneously, this new research focus also brings multitudes of unexplored architectural, data, technical, fairness, and ethical challenges. With our first edition of the Human-Centered Large Language Modeling (HuCLLM) workshop, we aim to create a platform where researchers can present rising challenges and solutions in building human-centered NLP models that bring together the ideas of human and social factors adaptation into the base LLMs of our NLP systems.

We received 35 submissions, of which 18 were accepted for presentation at the workshop. These papers will be presented at oral and poster sessions on the day of the workshop. The workshop day will also include keynote talks and a panel session on human-centered large language modeling. We thank all our participants and reviewers for their work. We hope you enjoy the first edition of HuCLLM and the research published in these proceedings.

Nikita Soni, Lucie Flek, Ashish Sharma, Diyi Yang, Sara Hooker, H Andrew Schwartz

HuCLLM 2024 Chairs

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# Program

**Thursday, August 15, 2024**

- 09:00 - 09:10     *Opening Remarks*
- 09:10 - 09:55     *Keynote 1*
- 09:55 - 10:30     *Oral Presentation 1*
- 10:30 - 11:00     *Coffee Break*
- 11:00 - 11:45     *Keynote 2*
- 11:45 - 13:45     *Poster Presentation*

*Human Speech Perception in Noise: Can Large Language Models Paraphrase to Improve It?*

Anupama Chingacham, Miaoran Zhang, Vera Demberg and Dietrich Klakow

*Human-Centered Design Recommendations for LLM-as-a-judge*

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*Aligning to Adults Is Easy, Aligning to Children Is Hard: A Study of Linguistic Alignment in Dialogue Systems*

Dorothea French, Sidney D’Mello and Katharina Von Der Wense



**Thursday, August 15, 2024 (continued)**

*[Non-Archival] Exploring Human-AI Interaction: A Case Study on the Diplomacy Game*

Shumin Deng, Jintian Zhang, Ningyu Zhang and Bryan Hooi

*[Non-Archival] Learning from Teaching Assistants to Formulate Subgoals for Programming Tasks: Exploring the Potential for AI Teaching Assistants*

Changyoon Lee, Junho Myung, Jieun Han, Jiho Jin and Alice Oh

*[Non-Archival] Reference-free Medical Multi-document Summary Evaluation Metric via Contrastive Learning*

Jimin Lee and Hwanhee Lee

*[Non-Archival] Offline RLHF Methods Need More Accurate Supervision Signals*

Shiqi Wang, Zhengze Zhang, Wang Xiaoliang, Rui Zhao, Fei Tan and Nguyen Cam-Tu

*[Non-Archival (Published Papers)] Direct Preference Optimization with an Offset*

Afra Amini, Tim Vieira and Ryan Cotterell

*[Non-Archival (Published Papers)] DOSA: A Dataset of Social Artifacts from Different Indian Geographical Subcultures*

Agrima Seth, Sanchit Ahuja, Kalika Bali and Sunayana Sitaram

*[Non-Archival (Published Papers)] Book2Dial: Generating Teacher Student Interactions from Textbooks for Cost-Effective Development of Educational Chatbots*

Junling Wang, Jakub Macina, Nico Daheim, Sankalan Pal Chowdhury and Mrinmaya Sachan

*[Non-Archival (Published Papers)] Evaluating Large Language Model Biases in Persona-Steered Generation*

Andy Liu, Mona Diab and Daniel Fried

*[Non-Archival (Published Papers)] My Answer is C": First-Token Probabilities Do Not Match Text Answers in Instruction-Tuned Language Models*

Xinpeng Wang, Bolei Ma, Chengzhi Hu, Leon Weber-Genzel, Paul Röttger, Frauke Kreuter, Dirk Hovy and Barbara Plank

12:45 - 13:45 *Lunch*

13:45 - 14:15 *Keynote 3*

14:15 - 15:00 *Oral Presentation 2*

**Thursday, August 15, 2024 (continued)**

15:00 - 15:30     *Brainstorming Session*

15:30 - 16:00     *Coffee Break*

16:00 - 16:30     *Keynote 4*

16:30 - 17:25     *Panel Discussion*

17:25 - 17:30     *Closing Remarks*