

Sabit Hassan | Curriculum Vitae

Address: 247 Republic St, Pittsburgh, 15211 PA

Mobile: +1 412 9839715 | E-mail: sabit@moonworks.ai | Website: <https://sabithsn.github.io>

Founder & Chief Executive Officer @ [Moonworks AI](#)

EDUCATION

PhD in Computer Science *University of Pittsburgh* Jan 2025

Dissertation: Active Learning Frameworks for Safe, Inclusive, and Democratic Conversational AI

Committee: Malihe Alikhani (Co-Chair), Jacob Biehl (Co-Chair), Diane Litman, Xiaowei Jia, and Silvio Amir

BSc in Computer Science *Carnegie Mellon University* 2014–2018

Minors: Mathematics and History

Thesis: Interactive Evaluation and Training of Classifiers under Limited Resources,

Advisors: Bhiksha Raj and Saquib Razak

HONORS AND AWARDS

Outstanding Paper Award	<i>Customizable NLP@EMNLP</i>	Nov 2024
Computer Science Dept. Fellowship	<i>University of Pittsburgh</i>	Aug 2023 – Apr 2024
Alexa Prize Taskbot Challenge Award	<i>Amazon</i>	Sep 2023
Alexa Prize Taskbot Challenge Grant	<i>Amazon</i>	Jan 2023
Kuzneski Innovation Cup Award	<i>Big Idea Center</i>	Nov 2022
Outstanding Academic Achievement	<i>Carnegie Mellon University</i>	May 2018
University Honors	<i>Carnegie Mellon University</i>	May 2018
SCS College Honors	<i>Carnegie Mellon University</i>	May 2018
History Honors	<i>Phi Alpha Theta</i>	May 2018
Carnegie Mellon Dean's List	<i>Carnegie Mellon University</i>	Apr 2015–Apr 2018
Best Design Award	<i>Carnegie Apps Hackathon</i>	Feb 2018
Best Technical Challenge Award	<i>Carnegie Apps Hackathon</i>	Feb 2017

RESEARCH

Doctoral Research *University of Pittsburgh* Aug 2021–Jan 2025

- Generative active learning, generative AI safety, dialogue systems, embodied agents
- Sign language generation, content moderation, contextual ASR, NLP in healthcare

Researcher *Qatar Computing Research Institute* Oct 2019–Jun 2021

- Pre-trained language model ([QARib](#)), dialect, offensive language, cross-lingual emotion detection
- Social Media Analytics Suite ([ASAD](#)), NLP processing tool ([Farasa](#))

Research Associate *Carnegie Mellon University Qatar* May 2018–Sep 2021

- Co-organized MADAR shared task on Arabic dialect identification
- Characterized oracle hierarchy for small one-way finite automata

TEACHING

Teaching Fellow *University of Pittsburgh* Jan 2025–May 2025

- Course instructor for CS 0012: Introduction to Computing

Guest Lectures

- Active Learning for Democratizing Safety and Fairness in LLMs **Northeastern University**, Mar 22, 2024
- Causal inference in LLMs, **Northeastern University**, Mar 19, 2024
- Machine Translation, **University of Pittsburgh**, Nov 15, 2023

Graduate Teaching Assistant	<i>University of Pittsburgh</i>	Aug 2021–Aug 2024
<ul style="list-style-type: none"> Intro to Natural Language Processing, Algorithms and Data Structures, Intro to Web Applications 		
Teaching Assistant	<i>Carnegie Mellon University</i>	Jan 2016–May 2018
<ul style="list-style-type: none"> Freshman Edge Summer Program, Great Theoretical Ideas in CS, Parallel and Sequential Data Structures and Algorithms, Fundamentals of Programming and CS, Concepts of Mathematics 		
Summer Internship Mentor	<i>Qatar Computing Research Institute</i>	May 2020–Jul 2020
<ul style="list-style-type: none"> Mentored interns on the use of machine learning in NLP tasks 		

SERVICES

- **Co-organizer**, MADAR Shared Task on Fine-Grained Arabic Dialect Identification, 2019
 - **Program Committee/Reviewer**: ARR, ACL, EACL, EMNLP, IJCNLP-AACL, Journal of NLP, IEEE MM, Heilyon, ICARD
 - **Member**, Student Academic Committee, Academic Review Board, Carnegie Mellon University Qatar
-

PUBLICATIONS [[Google Scholar](#)]

* denotes equal contribution

- [1] Alikhani, M. & **Hassan, S.**, *Hype and harm: Why we must ask harder questions about AI and its alignment with human values*. **BROOKINGS**, 2025
- [2] **Hassan, S.**, Chung, H, Tan, Z., & Alikhani, M. *Coherence-driven Multimodal Safety Dialogue for Embodied Agents*. **AAMAS**, 2025
- [3] **Hassan, S.**, Sicilia, A. & Alikhani, M. *An Active Learning Framework for Inclusive Generation by Large Language Models*. **COLING**, 2025
- [4] Asano, Y., **Hassan, S.**, Sharma, P., Sicilia, A, Atwell, K., Litman, D., & Alikhani, M. *Contextual ASR Error Handling with LLMs Augmentation for Goal- Oriented Conversational AI*. **COLING**, 2025
- [5] **Hassan, S.**, Sicilia, A, & Alikhani, M. *Active Learning for Robust and Representative LLM Generation in Safety-Critical Scenarios*. **Customizable NLP @ EMNLP 2024** [**Outstanding Paper Award**]
- [6] Sicilia, A., Asano, Y., Atwell, K., Cheng, Q., Gupta, D., **Hassan, S.** Inan, M., Nwogu, J., Sharma, P., Alikhani, M. *ISABEL: An Inclusive and Collaborative Task-Oriented Dialogue System*. **Amazon Science**, 2023. [**Alexa Prize Taskbot Challenge Award**]
- [7] **Hassan, S.** & Alikhani, M. *DisCCGen: A Framework for Discourse-Aware Counterspeech Generation*. **IJCNLP-AACL**, 2023
- [8] **Hassan, S.** & Alikhani, M. *D-CALM: A Dynamic Clustering-based Active Learning Approach for Mitigating Bias*. **ACL FINDINGS**, 2023
- [9] Wang, Y., Donovan, H.A.S., **Hassan, S.**, Alikhani, M. *MedNgage: A Dataset for Understanding Engagement in Patient-Nurse Conversations*. **ACL FINDINGS**, 2023
- [10] Ye, M., Sikka, K., Atwell, K., **Hassan, S.**, Divakaran, A., Alikhani, M. *Multilingual Content Moderation and Challenges: A Case Study of Reddit*. **EACL**, 2023
- [11] Mubarak, H., **Hassan, S.**, & Chowdhury, S. *Emojis as Anchors to Detect Arabic Offensive Language and Hate Speech*. **NLE**, 2023.
- [12] Atwell, K.* , **Hassan, S.***, Alikhani, M. *APPDIA: A Discourse-aware Transformer-based Style Transfer Model for Offensive Social Media Conversations*. **COLING**, 2022
- [13] Inan, M.* , Yang, Z.* , **Hassan, S.***, Quandt, L., & Alikhani, M. *Modeling Intensification for Signed Language Generation: A Computational Approach*. **ACL FINDINGS**, 2022
- [14] **Hassan, S.**, Shaar, S., & Darwish, K. *Cross-lingual Emotion Detection*. **LREC**, 2022
- [15] Mubarak, H., **Hassan, S.**, Chowdhury, S. A., & Alam, F. *Analyzing Arabic Tweets About COVID-19 Vaccination*. **LREC**, 2022.
- [16] **Hassan, S.**, Mubarak, H., Abdelali, A., & Darwish, K. *ASAD: Arabic Social Media Analytics and unDerstanding*. **EACL** 2021

- [17] Mubarak, H., **Hassan, S.**, & Abdealali, A. *Adult Content Detection on Arabic Twitter: Analysis and Experiments*. **WANLP 2021**
- [18] Abdelali, A., Mubarak, H., Samih, Y., **Hassan, S.**, & Darwish, K. *QADI: Arabic Dialect Identification in the Wild*. **WANLP 2021**
- [19] Mubarak, H., & **Hassan, S.** *Analyzing Arabic Tweets in the Early Days of Coronavirus (COVID-19) Pandemic*. **LOUHI, 2021**
- [20] Mubarak, H., Abdelali, A., **Hassan, S.**, & Darwish, K. *Spam Detection on Arabic Twitter*. **SocInfo, 2020**
- [21] **Hassan, S.**, Samih, Y., Mubarak, H., & Abdelali, A. *ALT at SemEval-2020 task 12: Arabic and English offensive language identification in social media*. **SemEval, 2020**
- [22] **Hassan, S.**, Samih, Y., Mubarak, H., Abdelali, A., Rashed, A., & Chowdhury, S. A. *ALT at OSACT Shared Task on Offensive Language Detection*. **OSACT, 2020 [Ranked 1st in subtask A]**
- [23] Mubarak, H., **Hassan, S.**, & Abdelali, A. *Constructing a bilingual corpus of parallel tweets*. **BUCC, 2020**
- [24] Bouamor, H., **Hassan, S.**, & Habash, N. *The MADAR Shared task on Arabic Fine-Grained Dialect Identification*. **WANLP, 2019. [co-organizer]**
- [25] Anabtawi, M., **Hassan, S.**, Kapoutsis, C., & Zakzok, M. *An Oracle Hierarchy for Small One-way Finite Automata*. **LATA, 2019**
- [26] **Hassan, S.**, Shaar, S., Raj, B., & Razak, S. *Interactive Evaluation of Classifiers Under Limited Resources*. **IEEE ICMLA, 2018**

Pre-prints:

- [27] Abdelali, A., **Hassan, S.**, Mubarak, H., Darwish, K., & Samih, Y. *Pre-Training BERT on Arabic Tweets: Practical Considerations*. **arXiv preprint arxiv:2102.10684 (2021)**

Abstracts:

- [28] **Hassan, S.***, Atwell, KJ.*, Alikhani, M. *Studying the Effect of Moderator Biases on the Diversity of Online Discussions: A Computational Cross-linguistic Study*. **CogSci, 2022**
- [29] Inan, M.*, Zhong, Y.*, **Hassan, S.***, Quandt, L., Alikhani, M. *Learning cognitive and linguistic prosodic categories for automatic cross-lingual sign language understanding*. **CogSci, 2022**