Masum Hasan

PhD Student, Computer Science, University of Rochester, NY https://masumhasan.net

Research Interest

ML ∩ Game Engines, Conversational AI, Synthetic Data

Publications

- SAPIEN: Affective Virtual Agents Powered by Large Language Models. **Masum Hasan**, Cengiz Ozel, Sammy Potter, Ehsan Hoque, **ACIIW 2023**
- <u>Auto-Gait: Automatic Ataxia Risk Assessment with Computer Vision on Gait Task Videos.</u> Wasifur Rahman, Masum Hasan, Md Saiful Islam, Titilayo Olubajo, Jeet Thaker, Abdelrahman Abdelkader, Phillip Yang, Tetsuo Ashizawa, Ehsan Hoque. UbiComp 2023
- <u>CoDesc: A Large Code–Description Parallel Dataset.</u> Masum Hasan, Tanveer Muttaqeen, Ishtiaq Niloy, Kazi Mehrab, Tahmid Hasan, Mahim Pantho, Wasi Ahmad, Rifat Shahriyar, Anindya Iqbal Venue: ACL Findings 2021
- <u>Using a Balanced Scorecard to Identify Opportunities to Improve Code Review Effectiveness: An Industrial Experience Report.</u> **Masum Hasan**, Anindya Iqbal, Amiangshu Bosu, Mohammad Rafid Ul Islam, A.J.M. Imtiajur Rahman.

Venue: EMSE (Journal), Impact Factor: 8.41

- Review4Repair: Code Review Aided Automatic Program Repairing. Faria Huq, Masum Hasan, Mahim Pantho, Sazan Mahbub, Anindya Iqbal, Toufique Ahmed. Venue: IST (Journal), Impact Factor: 6.93
- Hitting your MARQ: Multimodal ARgument Quality Assessment. Md Kamrul Hasan, James Spann, Masum Hasan Md. Saiful Islam, Kurtis Haut, Rada Mihalcea and Ehsan Hoque. Venue: EMNLP 2021
- Not Low-Resource Anymore: Aligner Ensembling, Batch Filtering, and New Datasets for Bengali-English Machine Translation. Tahmid Hasan, Abhik Bhattacharjee, Kazi Samin, Masum Hasan, Madhusudan Basak, M. Sohel Rahman, Rifat Shahriyar.
 Venue: EMNLP 2020
- Text2App: A Framework for Creating Android Apps from Text Descriptions. Masum Hasan, Kazi Sajeed Mehrab, Wasi Uddin Ahmad, Rifat Shahriyar. NLP4Prog, ACL-IJCNLP 2021
- Recognition of Bengali Handwritten Digits Using Convolutional Neural Network
 <u>Architectures.</u> Md Mahmudul Hasan, Md Rafid Ul Islam, Md Tareq Mahmood.
 Venue: ICBSLP 2018, **Best Student paper award**
- <u>Early Detection of Earthquake Using Satellite Based Quantum Computing.</u> Akhter Al Amin, **Mahmudul Hasan**, Kazi Sinthia Kabir, Tanzila Choudhury, ABM Alim Al Islam. Venue: **ICCSNT**, 2015
- <u>BERT2Code: Can Pretrained Language Models be Leveraged for Code Search?</u> Abdullah Al Ishtiaq, **Masum Hasan**, Md. Mahim Anjum Haque, Kazi Sajeed Mehrab, Tanveer Muttaqueen, Tahmid Hasan, Anindya Iqbal, Rifat Shahriyar, **ArXiv 2020**

Professional Experience

Graduate Research Assistant, ROC-HCI, University of Rochester, NY

Aug 2021 to Present

• Supervised by Dr. Ehsan Hoque

Research Assistant (RA), Applied Machine Learning Lab, BUET

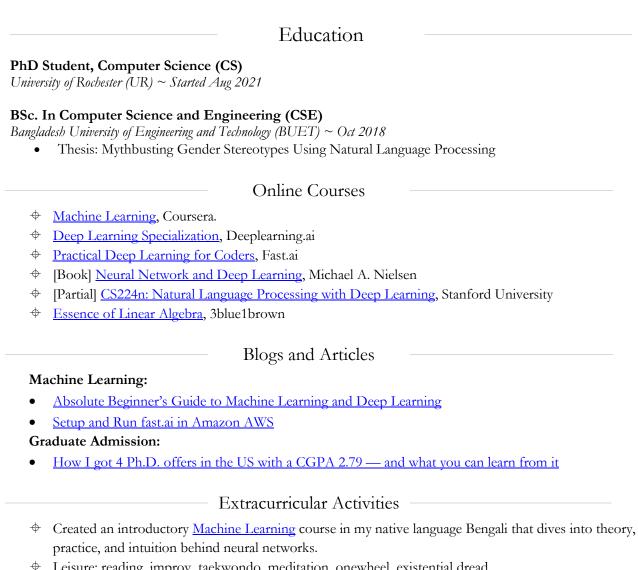
Nov 2018 to Jul 2021

- Supervised by, Dr. Rifat Shahriyar, Dr. Anindya Iqbal
- ML for source code: Source Code Summarization/Synthesis/Search/Repair/Compression
- NLP for Bengali: GPT-2, Bengali-English NMT

Cofounder and CEO, Bizzy Ltd.

Dec 2016 to Jul 2017

• <u>BizzyBd</u> started as an easy-to-use website building tool for non-programmer professionals.



• Leisure: reading, improv, taekwondo, meditation, onewheel, existential dread.