Bharat Srikishan

Stevens Institute of Technology, NJ
bsrikish@stevens.edu

Education

Stevens Institute of Technology - Hoboken, NJ
Ph.D. Computer Science
Advised by Prof. Nikhil Muralidhar
2019 - present

Columbia University - New York, NY
M.S. Computer Science
Specialization: Machine Learning
2016 - 2018

University of Illinois - Champaign, IL
B.S. Computer Science
2002 - 2007

Research Experience

Ph.D. Student - Stevens Institute of Technology

- Working with Professor Nikhil Muralidhar on combining deep learning models with scientific simulators to improve sample complexity and generalization.
- Research in feature selection and time-series causal inference applied to healthcare data with Professor Samantha Kleinberg.

Graduate Research Assistant - Columbia Department of Biomedical Informatics
2016 - 2018

- Worked with Professors Noemie Elhadad, Rajesh Ranganath, and Adler Perotte M.D. to implement a distributed variational inference algorithm for a large scale survival analysis project.

Teaching Experience

Teaching Assistant - CS 505: Probability and Stochastic Processes
Fall 2022

Teaching Assistant - CS 556: Mathematical Foundations of Machine Learning
Spring 2023, Fall 2023

Publications

Srikishan, B., Tabassum, A., Allu, S., Kannan, R., & Muralidhar, N. Reinforcement Learning as a Parsimonious Alternative to Prediction Cascades: A Case Study on Image Segmentation. Under Submission.

Srikishan, B., & Kleinberg, S. (2023). Causal Discovery with Stage Variables for Health Time Series. arXiv preprint arXiv:2305.03662.

Mirtchouk, M., **Srikishan, B.**, & Kleinberg, S. (2021). Hierarchical information criterion for variable abstraction. Machine Learning for Healthcare Conference 2021 (pp. 440-460). PMLR.

Don't Walk, O. B., Zucker, J., Gordon, P., Elhadad, N., Feller, D. J., **Srikishan, B.**, & Yin, M. T. (2018). Identifying Clinical Notes with Likely Documentation of Social and Behavioral Determinants of Health. AMIA 2018.

Feller, D. J., Zucker, J., **Srikishan, B.**, Martinez, R., Evans, H., Yin, M. T., ... & Elhadad, N. (2018). Towards the inference of social and behavioral determinants of sexual health: development of a gold-standard corpus with semi-supervised learning. AMIA 2018.

Srikishan, B., Ranganath, R., & Elhadad, N. (2017) Interpreting Comorbidity Groups via Risk Trajectories in the Health Record. NeurIPS 2017 ML4HC Workshop.

Service

Reviewer for IEEE Big Data 2023

Reviewer for ASONAM 2023

Workshops and Conferences

NeurIPS 2017 - Long Beach, CA

Machine Learning for Healthcare 2021 - Virtual

Skills

Programming experience in Python, Java, Javascript, and C++.
Machine learning implementation experience using PyTorch and Tensorflow.
Distributed systems experience using Hadoop, Hbase, and Kafka.

Industry Experience

Conductor Inc - Lead Software Engineer 2009-2015

- Worked as a back-end engineer and technical lead on a highly scalable search analytics platform.
- Worked with my team to design and implement a collection, data processing, and ETL pipeline for Google/Adobe analytics reports us- ing Hadoop, Hbase, Kafka, and Hive.