Meet P. Vadera

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Education

2017-Present	University of Massachusetts Amherst	MS/PhD (Computer Science)	GPA: 4.0/4.0
2012-2016	Indian Institute of Technology Gandhinagar	B.Tech. (Mechanical Engineering)*	GPA: 8.29/10

*Minor in Computer Science and Engineering.

Select Publications

- **Vadera M.**, Ghosh S., Ng K., and Marlin, B. Post-hoc loss-calibration for Bayesian neural networks. In *UAI (2021)*
- **Vadera M.**, Jalaian B., and Marlin, B. Generalized Bayesian Posterior Expectation Distillation for Deep Neural Networks. In *UAI (2020)*
- **Vadera M.**, Cobb A., Jalaian B., and Marlin B. URSABench: Comprehensive Benchmarking of Approximate Bayesian Inference Methods for Deep Neural Networks. In *ICML Workshop on Uncertainty & Robustness in Deep Learning (2020)*
- **Vadera M.**, Shukla S., Jalaian B., and Marlin B. Assessing the Adversarial Robustness of Monte Carlo and Distillation Methods for Deep Bayesian Neural Network Classification. In *AAAI Workshop on SafeAI (2020)*
- Holtsclaw C., **Vadera M.**, and Marlin, B. Towards Joint Segmentation and Active Learning for Block-Structured Data Streams. In *KDD Workshop on Data Collection, Curation, and Labeling (DCCL) for Mining and Learning (2019)* (Best Paper Award)

Work Experience

IBM Research (MIT-IBM Watson AI Lab)

Research Intern *June '20- Present*

- Worked on loss-calibrated inference for Bayesian neural networks. The goal of the project was to improve decision making on downstream tasks by correcting posterior distribution using decision-utility functions.

Kronos Inc.

Data Science Intern *June '18- August '18*

- Developed deep learning models to automatically predict late-edit risk in timecards. This leads to significant time saving for managers involved in time-keeping task due to automated sorting of high-edit-risk timecards
- Created automatic punch labeling system using deep learning consistent with the existing rule based system. This provides an alternate to the more complicated system for accelerating internal research studies
- Worked on an independent R&D project to develop neural network based models for volume forecaster at parity with existing production models

Innovaccer Inc.

Member of Technical Staff *June '16- July '17*

- Worked on Big data stack for developing *Datashop*- the company's flagship product
- Designed the software architecture, and developed modules of Data Quality Tool and Healthcare measures computation as core modules for the platform. This helped clients build and run a large set of measures through a plug-and-play framework

Technical Skills

Python, Scala, C, MATLAB, R, PyTorch, Keras, Weka, Apache Spark, MySQL, Elasticsearch, MongoDB

Awards

- NSF travel award to attend IEEE/ACM CHASE '19.
- Best paper award at KDD '19 Workshop on Data Collection, Curation, and Labeling (DCCL) for Mining and Learning.