Karan Samel

samelkaran@gmail.com (925) 400-3027
https://karans.github.io
1816 Plumeria Court, Pleasanton, CA 94566

TECHNICAL SKILLS:

- Proficient in Python, C++, Java, R, Linux/macOS systems.
- Experience working with NumPy, Theano, Airflow, Git, Tableau, and Gephi.
- Learning TensorFlow, Hadoop, and Spark.

EDUCATION

Purdue University, West Lafayette, IN

Bachelor of Science in Computer Science (Honors) and in Applied Statistics.   *August 2014 - May 2017*
GPA: 3.95

MAJOR COURSES

Artificial Intelligence, Data Driven Policy Making, Data Mining and Machine Learning, Machine Learning (Stanford - Coursera), Hadoop Platform and Application Framework (UCSD - Coursera), Algorithm Analysis, Data Structures, Systems Programming, Applied Regression Analysis, Time Series Analysis, and Linear Algebra.

EXPERIENCE

Neva AI: Data Science Intern   *July 2017 – Current*

- Neva works towards building AI and ML based tools to streamline internal ITSM processes.
- Designed and built a data pipeline to perform content extraction, keyword generation, and indexing for a wide range of documents.
- Working on active learning methodologies to validate data and improve model training.

NSF REU Fellow: Neural Network Prediction for Real Time Bidding   *August 2015 – May 2017*

- Worked on the iPinYou advertisement dataset that included multiple features describing a user and indicating if the user clicked a certain advertisement.
- Tested multilayer perceptrons and convolutional networks to achieve high prediction scores using a hybrid neural network and factorization machine model.
- Built external Nvidia Titan X GPU setup to run convolutional neural networks 80 times faster.
- Utilized Python NumPy, Theano tensors, and CUDA acceleration.
- Published in the Journal of Purdue Undergraduate Research Volume 7 (2017).

Purdue Aerial Robotics IEEE: Software Co-Lead   *August 2014 – August 2016*

- Built a plane that flies autonomously to follow waypoints, performs search patterns, and carries a small artificial payload to drop.
- Developed a communication API to send telemetry data and receive objectives from a remote Django web server to our ground control station.
- Created redundant systems to keep information flow intact between the plane, the ground station, and the competition server.

AWARDS & SCHOLARSHIPS

- Research Scholarship - National Science Foundation (NSF) Research Experience for Undergraduates (REU) - August 2015 - August 2016
- Presidential Scholarship - Awarded for 2014 - 2018