Shivam Agrawal

github.com/ShivamHacks | shivamhacks.github.io

EDUCATION

University of Maryland, College Park   **GPA: 4.00**
B.S. in Computer Science   *Expected Graduation: 2020*
First Year Innovation and Research Experience
  ● Conducting data-driven research on factors affecting global entrepreneurship.
Quantitative Finance Society
  ● Researching techniques and strategies for automated trading. Deploying algorithms on Quantopian platform.

EXPERIENCE

Change the World Consulting   **College Park, MD**
Student Consultant   *September 2017 - December 2017*
  ● Worked with a team of undergraduates to provide marketing guidance to ArtsCentric, a Baltimore-based non-profit theater company. Focused on improving volunteer recruitment and retainment and devised several solutions ranging from partnership strategies to ideas for improving their digital presence.
  ● Program oversight provided by Deloitte & The Robert H. Smith School of Business.
GNext Education   **Edison, NJ**
Web Developer   *September 2015 - December 2015*
  ● Developed and managed all software for the company's premier robotics competition, SALL Champs, including website, social media, and live comment page.
  ● Worked within a small timeline and under many constraints to deliver high quality software. The live comment page was developed within under a week and withstood hundreds of users with concurrent requests. Written in Javascript, HTML, and CSS, and used a Parse backend.
ICEpiration   **Somerset, NJ**
Lead Intern, Content Developer, Speaker   *May 2015 - August 2015*
  ● Co-Led a team of high school interns in developing and presenting the technology portion of the content for a technology-entrepreneurship boot camp. Taught over twenty students the concepts of full stack computer programming, and developed a demo full-stack web application, a chat server, for the students to pick apart.

PROJECTS

Digit Classifier   *January 2018*
  ● Built a digit classifier in Python using the KNearestNeighbor classifier. Submitted to Kaggle competition "Digit Recognizer" and obtained 97.5% accuracy, ranking 1237th out of 2075 globally ranked data scientists.
Built Neural Network from Scratch   *September 2017 - December 2017*
  ● Translated mathematical foundations of neural networks in Pattern Recognition and Machine Learning by Christopher M. Bishop into runnable Python code. Trained my neural network to fit various mathematical functions and benchmarked my performance against Tensorflow. Presented my work at the Math Department.
  ● Presentation: https://github.com/ShivamHacks/DRP-Neural-Nets/blob/master/presentation.pdf
BusNotify   *PennApps Fall 2016*
  ● An Android app that notifies students two minutes before their bus comes to their stop. The app works by detecting when students at previous stops get onto the bus and uses this information, as well as traffic estimations, to predict the arrival time at at future stops.
PictureUs   *June 2015 - August 2015*
  ● Created and published a social media app for Android. The primary feature of the app was easy and instantaneous group photo sharing. Over 5000 lines of code in NodeJS and Java combined. Deployed on AWS Elastic Beanstalk, using MongoDB as the database and Cloudinary as the image back-end.

Strong: Java, Python (NumPy, Pandas, Scikit-Learn), Javascript (NodeJS, JQuery), Amazon Web Services, HTML/CSS
Working Knowledge: Tensorflow, OpenCV, Heroku, MongoDB, MATLAB
Tools: Github, Excel, Android Studio
Relevant Courses: Applied Statistics and Probability, Object Oriented Programming, Multivariable Calculus