James Mullenbach

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EDUCATION

Master of Science in Computer Science (Specialization: Machine Learning),
Georgia Institute of Technology (Atlanta, Georgia) Expected May 2018

Bachelor of Science in Computer Science (Concentrations: Intelligence & Media),
Bachelor of Science in Physics,
Georgia Institute of Technology (Atlanta, Georgia) December 2016
GPA: 3.93/4.00

Certificate in *Data Manipulation at Scale: Systems and Algorithms*, Coursera (U Washington)

RELEVANT EXPERIENCE

Software Engineering Intern May 2016 - Aug 2016
Urjanet Atlanta, GA

- Developed, debugged, tested, and deployed various new features for a group of cloud microservices, such as distributed logging and aggregation.
- Scripted critical money-saving AWS tasks such as upgrading API usage and cleaning unused EC2 resources in bash and Python to keep spending lean.
- Wrote and performed integration, end-to-end, and load tests with JUnit and JMeter to identify issues with cloud resources and scalability.

Undergraduate Research Assistant Aug 2015 - May 2016
Borodovsky Computational Genomics Laboratory Atlanta, GA

- Performed thorough data aggregation, cleaning, and statistical analysis in Python towards developing machine learning algorithms to identify genes using ribosome profiling data.
- Presented weekly research updates detailing progress, difficulties, and future work.

Software Engineering Intern May 2015 - Aug 2015
Urjanet Atlanta, GA

- Upgraded data extraction operation to asynchronously pre-process PDF images, employing AWS and enhancing scalability for expected influx of ∼20,000 image sets per month.
- Worked with an agile team to ship first release of both a client web portal and RESTful API, making UI/UX design decisions to improve the overall client experience.

Undergraduate Research Assistant May 2013 - May 2015
Georgia Tech School of Physics Atlanta, GA

- Built apparatus to study dynamics and bifurcations of two-dimensional fluid flows.
- Programmed GUI and utilized image processing to study phagocytosis of white blood cells.

TECHNOLOGY SKILLS

Programming Languages: Java, Python, MATLAB, JavaScript, C, SQL
Technologies: Spring, AWS, Linux/bash, Git, jQuery, MapReduce, Play!, Spark

SELECTED PROJECTS

Natural Language Processing directed study - Python (numpy, scipy, matplotlib, nltk)

- Solve problem sets and participate in a directed study in NLP with Professor Jacob Eisenstein.

Relevant Image Suggestions - Python Flask, Heroku, NLTK, various APIs (Team Project)

- Built an interactive Chrome Extension to display suggested images to accompany a body of text, using Google Search, face detection, and NLP techniques.

WorkReadyGrad mobile application - AngularJS, HTML/CSS, Git (Team Project)

- Developed a hybrid mobile application prototype designed to prepare college students for post-graduate life. Responsible for social network sharing and several individual features.

SELECTED ACTIVITIES & LEADERSHIP

President, Delta Sigma Phi Nov 2015 - Nov 2016

- Oversee all organization functions, set and maintain alignment towards goals, and lead weekly Executive Board and general chapter meetings for over 60 members.
- Developed data-based brother review process to help members identify strengths and set goals.

New Student Orientation Leader (FASET), Georgia Tech Mar 2016 - Aug 2016

- Facilitate orientation activities and acclimate new students to the campus environment.

Campus Tour Guide, Georgia Tech Sep 2013 - Dec 2015

- Represented Georgia Tech to over 60 prospective students, parents, and visitors per month through tours tailored to accommodate unique needs and requests.