# Timothy X. Wang

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#### **EDUCATION**

## University of Maryland, College Park

College Park, MD

B.Sc. in Computer Science & Mathematics

May 2020

GPA: 4.0/4.0 | QUEST Honors Program | ACES Honors College | Presidential Scholar | National Merit Finalist

#### **SKILLS**

Java, Machine Learning, Python, C, C#, MapReduce, Apache Crunch, PySpark, Hadoop, Bash, SQL

## **EXPERIENCE**

## **Sift Science** | Software Engineering Intern

San Francisco, CA

June - Aug 2017

- Implemented parallelized and memory efficient Naïve Bayes text classification Machine Learning models that process ~12TB of data
- Developed Ensemble models used to analyze 150 million daily events
- Parallelized feature extraction and scaled offline training pipeline with MapReduce that lowered Machine Learning experiment runtimes by 40%
- Engineered 100+ new features that improved model performance

## University of Maryland- Dept. of Computer Science | Undergraduate Teaching Assistant

College Park, MD

Jan - May 2017

- Undergraduate TA for CMSC132: Advanced Java and Data Structures
- Led 2 recitations per week and multiple weekly office hours to reinforce concepts and introduce new material

## **Cipher Systems** | Software Development Intern

Annapolis, MD

Dec 2016 - Feb 2017

• Developed NLP microservice in Java to semantically tag news articles using Stanford's CoreNLP library

## **ContentAnalytics** | Software Engineering Intern

San Francisco, CA

Oct 2016- Jan 2017

- Developed image and video comparison tool to improve E-Commerce for multiple Fortune 500 companies
- Engineered data transfer architecture between Amazon S3 and Adobe's Scene7

## RESEARCH

# University of Maryland- Dept. of Computer Science and Math | Undergraduate Research Fellow

College Park, MD

May – Oct 2016

- Researched and optimized Pollard's Rho factorization algorithm by approximately 1200%
- Worked alongside Professor Bill Gasarch and a diverse team of fellow UMD students

## PROJECTS & ACTIVITIES

## University of Maryland's Ballmer's Peak

Aug – Sep 2017

• Built interactive web application using Flask and SQLite3 for UMD's first Ballmer's Peak coding competition

**Supermodel**• Web application using scikit-learn and GridSearch to generate hyper-tuned machine learning models

## **Consult Your Community** | Business Analyst

Feb - May 2017

• Provided pro-bono consulting services and machine learning tool to local restaurant dining start-up, Spotluck

Bipartisan Feb 2017

- A web application that combats misinformation by leveraging machine learning to filter credible news
- Created natural language processing pipeline to tokenize text and extract sentiment and entity analysis

Method to the Madness Sep 2016

• Developed a Neural Network from scratch in Java that predicts March Madness collegiate basketball results