HAODONG ZHAO
hzhao19@stevens.edu| (917)-618-5966 | Hoboken, NJ

EDUCATION

Stevens Institute of Technology, Hoboken, NJ **July 2017 – May 2019**
Master of Science in Business Intelligence and Analytics
Coursework: Big Data Technologies, Data Mining, Database Management System, Experimental Design, Multivariate Analysis, Web Mining, Social Network Analysis, Optimization and Process Analytics, Financial Decision Making

Clarkson University, Potsdam, NY **July 2015 – December 2016**
21 credits in Master's in environmental engineering

Beijing Normal University, Zhuhai, China **September 2010 – July 2014**
Bachelor's in environmental engineering

SKILLS

- **Programming Languages and Software**: Python, Java SE, R, SAS, JMP, AutoCAD
- **Database**: MySQL, PostgreSQL, MongoDB
- **Natural Language Process:** Word Embedding, Topic Modeling, Sentiment Analysis
- **APIs**: Scikit-learn, Pandas, Numpy, TensorFlow, Keras, Scrapy, PySpark
- **Big Data Technologies**: Hadoop, Apache Spark, Cloudera
- **Machine Learning**: Linear/Logistic Regression, SVM, Random Forest, Clustering, KNN, SVC, XGBoost
- **Business Intelligence Tools**: Tableau, Microsoft Office, Microsoft Power BI, IBM DataStage, R Shiny, Kaggle

EXPERIENCE

Penghua Fund Management Co. Led, Shenzhen, China **February 2017 – July 2017**
Data Analyst

- Analyzed market trends of financial fund products over 20k$ including stock and debt and reported the insights to required banks as well as marketing teams to support and improve financial funds.
- Implemented V-LOOkUP, H-LOOKUP, Pivot Tables and Solver to create Excel reports, used Python for analysis and developed posters of the insights using Tableau
- Supervised the obtained insights along with marketing team and increased the obtained funds by 11%
- Analyzed the market and industry, forecasting a number of stocks that have risen more than 20% in a month

ACADEMIC PROJECTS

Email Spam Detection **February 2019 – May 2019**

- Implemented web crawler method in Python to get personal email data, and explored the difference between spam email and ham email by exploring data analysis and TF-IDF text mining method
- Designed a classification model based on the difference between spam email and ham email. Obtain the most accurate classifier by test different machine learning methods and classification objects
- Provide information to companies to help them avoid the situation where important emails sent are misclassified as spam emails

Success Rate Prediction for Crowd Funding **February 2019 – May 2019**

- Predicted the success rate of a Kickstarter project by implementing Decision trees, Logistic Regression, Random Forest and GradientBoost Tree in Pyspark. Best prediction accuracy obtained is 72%
- Implemented the above machine learning algorithms on cloud (Databricks) in Pyspark using 500,000 rows of data to decrease the run time of an algorithm and make the model compatible with real time big data

Exploration of Users' Consume Pattern in Yelp's restaurants **August 2018 – December 2018**

- Designed a model which helps the restaurants to distinguish active and inactive reviewers on yelp and work on the "factors to be improved" by reading reviews of active users
- Implemented using analyzing the differences between the frequency words of active users and inactive users. R studio and Tableau software are used
- Provided data to Yelp's restaurants to help them find active target users based on user comments

Digit Recognition **August 2017 – December 2017**

- Developed machine learning models to test the precision of handwritten digit recognition and helped in improving the digit identification. Trained the model using real-time data.
- Implemented using machine learning algorithms in R studio and Python and analyzed models to assess precision and accuracy of outcomes

ACTIVITIES

- Indian Graduate student Association, Steven BIA club member **August 2018 – May 2019**
- Organizer of Spring Festival Gale at Clarkson University **February 2016**
- Minister of Activities in Clarkson University's Chinese Students and Scholars Association **August 2015 – December 2016**