Brian A. Heckman

TECHNICAL EXPERIENCE

Machine Learning Engineer

Vanguard

July 2019 - Present

- Designed and developed API for fund comparison scoring model resulting in savings of \$200,000 yearly for Vanguard
- Deployed, built, and performance tested production APIs for 14 NLP models
- Added cross account RDS support to Vanguard's internal AWS Secrets Manager implementation
- Python, Java, PostgreSQL, AWS, LocustIO, Docker, Tensorflow

Software Engineer

GE Digital

June 2017 - July 2019

- Built prototype for new machine learning algorithm to predict downtime for industrial equipment
- Implemented Apache Airflow into proprietary Spark service to schedule job orchestrations
- Transitioned on-prem monolithic anomaly detection application to cloud based microservices platform helping scale asset monitoring capabilities by 10x
- Java, Python, C#, Apache Airflow, Spring, PostgreSQL, Tableau

Software Engineering Intern

GE Digital

Summer 2016

- Implemented SmartSignal Predictive Analytics in .NET core for integration with Cloud Foundry in order to increase total asset instances from 200 to over 200,000
- Created RESTful API to display all TeamCity build information with current status updates
- C#, C++, XUnit, JavaScript, Node.js

EDUCATION

PROJECTS

B.S. Computer Science

Syracuse University

May 2017

Minor: Economics, Mathematics

CGPA: 3.6

Major GPA: 3.73

(github.com/baheckman)

Stock Market Prediction Project

(Python, Scikit-learn, pandas, numpy, matplotlib)

Compared various regression algorithms to predict Dow Jones stock prices

Halos Mobile Tour App

(Android SDK, Java, Python, Flask, MongoDB)

- Built REST web service with Flask micro-framework to communicate with Android and iOS apps
- Utilized Google Places and Maps API to asynchronously get list of attractions near current location and give directions to each landmark in sequential order
- Designed Android User Interface for entire application

SKILLS

Languages: Java, Python, Go, Haskell, R, SQL