**RELEVANT EDUCATION**

Case Western Reserve University Graduated August 2016

Master of Science in Physics GPA 3.7

Thesis: *Business Opportunity Analysis of Wearable Electromyography Sensors in Athletics*

Baldwin Wallace University Graduated May 2014

Bachelor of Science in Physics, Minor in Mathematics GPA 3.8

**RELEVANT WORK EXPERIENCE**

AmTrust Financial

Business Systems Analysis May 2021 – Present

* Translate business requirements into functional specifications for large and complex projects
* Query SQL databases to find and explore data to support writing functional specifications

Comsat Architects

Lead Systems Analyst July 2016 – April 2021

* Used advanced modeling and simulation software to analyze dynamic performance of complex systems to define the communications architecture of a space system including Deep Space Gateway, an Optical Relay, a Lunar Relay, and a Lunar Lander.
* Interfaced with multiple NASA Glenn technical teams to model and analyze dynamic systems to support decision making in projects
* Led team in writing concise final study reports and presented results to NASA Glenn stakeholders
* Extracted analysis and modeling techniques from technical papers for SMEs
* Documented technical processes to streamline future analysis, improving quality of regular tasks
* Wrote training material for system analysis and design and integrated it into the company onboarding process, reducing technical onboarding time by half.

**RELEVANT CERTIFICATIONS Completion Date**

* Python for Data Science and Machine Learning January 2021
* Probability and Statistics for Business and Data Science March 2021
* Computer Science Using Python April 2021
* Python for Finance: Investment Fundamentals and Data Analytics October 2021

**RELEVANT PROJECTS**

* Applied Machine Learning algorithms using Scikit-Learn to various projects, including:
  + Linear regression for food truck profits based on city’s population
  + Logistic regression with advertising data to predict is a user clicked on an advertisement
  + Random Forest algorithm on lending data to determine if a borrower paid back a loan
  + K-Means clustering to divide universities into two groups, private and public
* Created a choropleth map with Python to visualize COVID vaccination rates of different countries
* Performed Monte Carlo simulations to forecast stock prices
* See GitHub for comprehensive list of projects

**RELEVANT LANGUAGES AND TECHNOLOGIES**

Python, Pandas, Scikit-Learn, Numpy, Matplotlib, Seaborn, MS Excel, SQL