# Raymond A. Sutrisno

email raymond@sutrisno.me
phone 909 706 1288
github tetrovolt
linkedin in/tetrovolt

## Education

•University of Houston (2016 - 2020) GPA3.94

Major: Bachelors of Computer Science, Minor: Mathematics

#### Skills

Front-End Technologies HTML, CSS

Back-End Technologies NodeJS, Express, Postgresql

Machine Learning ScikitLearn, Keras, Tensorflow, numpy, pandas, OpenCV

Programming Languages Python, Java, C++, JavaScript

Tools bash, git, make, linux/unix, LATEX, matlab

# **Projects Experience**

Reamer IP Bot Fall 2018

• Discord bot used for WAN ip retrieval for house.

• Used to circumvent needing a static ip business plan from internet provider.

• Works as both a discord bot with command and a http server with JSON api.

• project-link: github.com/TetroVolt/ReamerHouseBot

Java Ray Tracer Spring 2018

• Ray tracer rendering demo written Java.

• Main goals were to simulate refraction from transparent objects and reflection geometry.

• project-link: github.com/TetroVolt/Java-RayTracer

Expressions Evaluator Spring 2017

• Simple Mathematical Expression Evaluator written in Java. Written without regex for tokenization. Uses reverse polish notation.

•project-link: "github.com/TetroVolt/Expressions

# Job Experience

### • Teaching Assistantships, University of Houston

Various

- (Spring 2019) Advanced Machine Learning (for Graduates)
- (Fall 2018) Introduction to Computer Science (for Undergrads)
- (Spring 2018) Artificial Intelligence (for Undergrads)
- (Fall 2017) Machine Learning (for Graduates)

#### •NSF Research Assistant Internship, University of Houston

**Summer 2018** 

- Topic: Image Classification of Dewetting Microscopy
- Implemented image processing techniques enhance and extract features from microscopy images of polymer dewetting.
- Techniques formalized into preprocessing pipeline for machine learning.
- Trained and tested various models such as SVM, Neural Networks, Random Forest.
- project-link: github.com/gtoti/Summer2018REU

## •Research Assistant, University of Houston

Summer 2017

- Tasked with implementing "Query By Committee" active machine learning algorithms from research papers for galaxy distance estimation using photometric astronomical data.
- •Paper: R. Vilalta, R. Sutrisno, E. E. O. Ishida, R. Beck, R. S. de Souza, A. Mahabal, "Photometric Redshift Estimation: An Active Learning Approach" IEEE SSCI 2017.

#### **Publications**

•R. Vilalta, R. Sutrisno, E. E. O. Ishida, R. Beck, R. S. de Souza, A. Mahabal: "Photometric Redshift Estimation: An Active Learning Approach" IEEE SSCI 2017

#### Awards

- •University of Houston Deans List
- •HP CodeWars 2016 3rd Place, Hewlett Packard March 2016

HP Code Wars Computer Science Competition in Houston, TX