

Dillon B. Allen

U.S. Citizen

Visalia, California

Cell: 559-901-8162

Email: dillon.allen.92@gmail.com

Objective: To apply my knowledge of data analysis, statistical methods and mathematical analysis to cutting edge engineering problems.

Technical Skills

- Mathematical Modeling and AI Modeling
- Kalman Filter and Smoothing Algorithms
- Estimation Algorithms
- Data Driven Design
- Simulation Design
- Statistical and Machine Learning
- Stochastic Models, Monte Carlo Methods
- MATLAB / C++ / Modern Fortran / Python / C

Engineering Experience

College of the Sequoias – Visalia, CA

Aug 2023 – Present

Engineering Professor

- Teach MATLAB, Computer Architecture, Discrete Mathematics, Introduction to Engineering, Engineering Graphics (SolidWorks), Engineering Statics, Material Science, Engineering Circuits.

John's Hopkins Applied Physics Lab – Laurel, MD

May 2023 – Aug 2024

ATLAS Intern

- Conduct statistical analyses on big data sets to develop efficient compression algorithms.
- Simulation design and analysis in AFSIM.
- Developed probabilistic models for operational usage in MATLAB and Python.

Lockheed Martin, Space – Sunnyvale, CA

Jan 2022 – Jan 2023

Guidance, Navigation and Control Engineer

- Conduct statistical analyses on big data sets to draw design conclusions
- Present analyses and design conclusions to chief engineers and stakeholders
- Monte Carlo Probabilistic Simulations for Systems Engineering Work
- Create Mathematical Models for IRAD Studies
- Implement/design clustering and discrimination algorithms
- Simulation Development for GNC IRADs

SAIC – Oxnard, CA

July 2019 – July 2020

Electrical Engineer – *High Power Electronic Attack Technique Radiation Group*

- Requirement Analysis on Next Generation Jammer – Mid Band.
- Developed software to automate test point analysis and report creation.
- Wrote Detailed Methods of Test reports and supervised test runs.
- Generated Verification and Validation Matrices.
- Implemented custom NI VISA scripts for instrumentation and data collection.

Education

Fresno State University

Est. May 2026

M.S. Mathematics

Johns Hopkins University, Whiting College of Engineering

Dec 2021

M.S. Space Systems Engineering

University of California at Santa Barbara, College of Letters and Science

June 2017

B.S. Physics