

Amir Alexander Abed

alexanderaa2000@gmail.com (714) 400-6759 amirabed.com

WORK EXPERIENCE

RTX (Raytheon) / Radar Software Engineer II

April 2026 - Present, Fullerton, CA

- Refactored legacy codebase to improve readability, and maintainability
- Contributed to the design and implementation of algorithms using proprietary internal tools

RTX (Raytheon) / Signal Processing Engineer I

April 2023 - April 2026, Tucson, AZ

- Implemented and tested research papers in prototype system design for angle estimation
- Developed and tested a version of the Lottery Ticket Hypothesis in Python which reproduced results verified in original paper
- Designed and implemented radar signal processing algorithms in C++, analyzed changes to system using existing software, and presented results to display improvements in performance
- Implemented LSTMs in MATLAB and completed data analysis in Python for time series data

Agnetix / Sensor Development Intern and Full-Time Electrical Design Engineer

June 2021 - December 2022, 7965 Dunbrook Rd STE I, San Diego, CA 92126

- PCB design for sensor boards in Altium and enclosure design in Solidworks and Onshape
- Sensor development with soil, temperature, humidity, light, airflow, and lidar sensors

RF Precision Cables / Technical Assistant

June 2016 - August 2020 (During Summer), 1600 S Anaheim Blvd F, Anaheim, CA 92805

- Assured quality control through testing procedures after fabrication and testing of RF cables.

EDUCATION

UNIVERSITY OF ARIZONA 1200 E University Blvd, Tucson, AZ 85721

M.S. in Electrical Engineering, Machine Learning Depth, December 2025

- Radar Signal Processing: MATLAB project processing a radar data cube
- Quantum Sensing and Quantum Machine Learning: Quantum Neural Nets combined with Deep Neural Networks to tackle image classification problem
- AI/ML Neural Networks: Recurrent Networks, Transformer Networks, CNN, DNN
- SDR using PLUTO+: CW radar project to collect radar data and form RDMs

UNIVERSITY OF CALIFORNIA SAN DIEGO 9500 Gilman Dr., La Jolla, CA 92093

B.S. in Electrical Engineering, Machine Learning Depth, June 2022

SKILLS & CERTIFICATIONS

- Languages: C, C++, Python, MATLAB
- Technologies: Linux, Docker, MySQL, Arduino, Raspberry Pi, PIC32, MS Office, Git, Bash
- Equipment: Oscilloscope, Multimeter, Spectrum Analyzer, Soldering, Breadboarding
- Design: Altium Designer, Solidworks, Onshape, MPLAB IDE, Quartus Prime
- EIT Certificate, July 2023