

# Ben Salak

• +1 (703) 615 5924 • [bwsalak@crimson.ua.edu](mailto:bwsalak@crimson.ua.edu) • [in benjamin-salak](https://www.linkedin.com/in/benjamin-salak) • [bensalak.com](http://bensalak.com)

## Education

### The University of Alabama, GPA: 3.66 / 4.0

*M.S. Aerospace and Engineering Mechanics*

Culminating Research Experience: planetary descent guidance

Online

August 2023 – Present

Expected completion: May 2026

### Rose-Hulman Institute of Technology, magna cum laude, GPA: 3.72 / 4.0

*B.S. Mechanical Engineering, Dynamics and Controls Concentration*

Terre Haute, IN

August 2018 – November 2022

## Experience

### Raytheon Technologies

Guidance, Navigation, and Control (GNC) Engineer II

Tucson, AZ

July 2025 – August 2025

GNC Acting Cross Product Team Lead (CPTL)

March 2024 – March 2025

GNC Engineer I

April 2023 – July 2025

### Altec

Controls Developer Intern

St. Joseph, MO

June 2022 – August 2022

- Built firmware in MATLAB Simulink to implement 8 next gen aerial unit control features and validated firmware with software and hardware in-the-loop testing using CanKing and CANape

### Rose-Hulman Institute of Technology

Research Assistant, open-source liquid chromatography

Terre Haute, IN

September 2019 – December 2021

- Codeveloped and presented to faculty a low-cost (under \$300) force amplification linkage by using parts from low-cost scales and 3D-printed and laser-cut parts

### Daifuku Wynright

Controls Engineering Intern

Bolingbrook, IL

June 2021 – August 2021

- Collaborated with 6 controls engineers to commission a 1.6 million sq. ft. advanced PLC conveyor sorting system

### Collins Aerospace

Engine Systems Intern

Rockford, IL

March 2020 – August 2020

- Reprogrammed Excel-based design tools with MATLAB software, improving analysis speed by a factor of 12

## Additional

**Skills:** Kalman filtering, Monte Carlo analysis, navigation and target tracking, high performance grid computing, Linux, 3D dynamics, orbital mechanics, state space and PID control, bond graph, robotic/linkage kinematics

**Programs:** MATLAB, Simulink, C++, Python, Java, Git, Arduino IDE, SOLIDWORKS, Orbital STK

**Languages:** Fluent in French

**Awards:** 2 time Raytheon Achievement Award recipient, Collins Aerospace Competitive Excellence Award, National French Contest Gold Medalist

**Certifications:** FE/EIT Exam, OSHA 10-hour Construction Safety and Health

**Leadership:** Raytheon GNC Cross Product Team Lead (CPTL), Rose-Hulman Bonfire Committee member, Rose-Hulman student government representative

**Community Involvement:** Community Food Bank of Southern Arizona, Habitat for Humanity