

# Austin Jones

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**Objective:** Software Engineer with experience in Embedded Software and Cloud Development looking for cool problems to solve. Currently looking for employment starting Dec 2023.

## Skills

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Cloud Technologies: Docker, K8s, AWS, GitHub Actions, Postgres  
Embedded Technologies: ARM MCUs, Xilinx FPGAs/MPSoCs  
Project Management: GitHub, GitLab, Jira, Confluence, Agile  
Languages: C, Rust, C++, Go, Shell, Python, VHDL

## Education

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**University of Tennessee Knoxville**

Graduation: Dec 2021

Bachelor of Science in COMPUTER ENGINEERING

GPA: 4.0/4.0

DEC 2021 - **Engineering Professional Practice Office** - University of Tennessee

AUG 2019 *Student Ambassador*

Assist UT engineering students to improve resumes, interview/inter-personal skills, and overall professional skills. Work with other ambassadors to facilitate networking events and career fairs.

## Work Experience

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NOV 2023 - **PolySign** - Remote

JAN 2022 Collaborated with many teams across multiple products and technologies to build out features and products for a Digital Asset Custodian in the quickly evolving Cryptocurrency market.

**Senior Software Engineer:** Jan 2023 - Nov 2023

- Contributed to Escrow feature of Python microservice backend to meet new customer requirements:
  - Redesigned feature data model to increase robustness.
  - Designed a new data flow to allow for more flexibility in the feature.
- Implemented an end-to-end POC for an unreleased feature across multiple projects.
- Worked on legacy C/Rust codebase to support features in other products.
- Performed monthly Dev-on-Call rotations debugging live issues across multiple environments including: dev, testing, pre-prod, and prod.
- Planned, hosted, and participated in a company wide Hackathon.
- Organized and hosted a weekly engineering reading club.

**Software Engineer:** Jan 2022 - Dec 2022

- Helped stand up a green field project in Rust aimed at performing fast, distributed multiparty compute signing:
  - Designed fully asynchronous architecture for distributed message signing increasing efficiency and robustness.
  - Overhauled network stack to use Tokio's Tonic gRPC over VirtioVsock Sockets increasing dev velocity and code cleanliness.
  - Redesigned CI/CD Pipeline to minimize redundancy in builds, regression testing, and integration testing.
  - Integrated with main product as a POC.

AUG 2021 - MAY 2021	<b>Garmin International</b> - Olathe, KS <i>Embedded Software Intern</i> Developed code for microcontroller to control power on logic for an unreleased product. <ul style="list-style-type: none"> <li>• Utilized MCU to monitor main board status and determine the power state of the board.</li> <li>• Referenced PCB schematics and MCU documentation to integrate software and hardware.</li> <li>• Gained strong familiarity with ARM/STM microcontrollers.</li> </ul>
NOV 2021 - JAN 2019	<b>Siemens Molecular Imaging</b> - Knoxville, TN <i>Electrical R&amp;D Intern</i> Conduct projects, both individually and collaboratively, to provide value to the ER&D team: <ul style="list-style-type: none"> <li>• Presented findings from work to a large technical audience to demonstrate the validity of a new system architecture.</li> <li>• Long term projects:               <ul style="list-style-type: none"> <li>– Utilize a Xilinx MPSoC to test limitations of ARM Core processing vs an FPGA implementation to assess cost reductions.</li> <li>– Used multiple Raspberry Pis with off the shelf networking hardware to conduct data path tests and compare the bandwidth with current custom solutions.</li> <li>– Work with a team of engineers using GitLab to write various driver code for a custom Linux image.</li> <li>– Developed Firmware, Embedded Software, and Application Software for a unit test fixture that is used during production of PET electronics.</li> <li>– Collaborated with a fellow intern to build a GUI Application that monitored and report the status of and entire system including all sub-assemblies.</li> </ul> </li> <li>• Assist engineers with general tasks (e.g. wiring, testing, Python scripts, documentation).</li> </ul>

## Interests and Hobbies

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- Custom Mechanical Keyboards, Basic Electrical Projects, Competitive Programming
- Chess, Go, Reading, Cooking
- Rock Climbing, Cycling, Specialty Coffee