

SUMMARY

I have been passionate about computers and technology since a young age. With proficiency in various programming languages and technologies, I have demonstrated the ability to learn and adapt to new languages and techniques quickly.

My professional experience spans both software engineering and IT industries, where I have successfully applied my skills to develop and implement innovative solutions. I am particularly interested in leveraging my programming expertise to create a positive, real-world impact. I firmly believe that one line of code has the potential to drive significant change.

Additionally, I am deeply committed to the Linux and open-source communities, consistently contributing to and supporting various projects within these ecosystems. My technical expertise includes proficiency in Rust, Python, and Java and experience with frameworks such as Actix, FastAPI, and Spring Boot. I am also adept at using tools like Git, Docker, and Nix, and I have extensive experience with Linux distributions, including Arch Linux and NixOS.

“I just love computers“

EDUCATION

Egyptian E-Learning University
Bachelor of Information Technology

Dokki, Egypt
Jul. 2020 – Aug. 2024

Beni-Suef University
Bachelor of Computer Science

Beni-Suef, Egypt
Oct. 2020 – Aug. 2024

EXPERIENCE

Software Developer
Raya Information Technology

Nov 2024 – Present
6th of October City, Egypt

- Developing and maintaining the Transaction Middleware for our banking clients
- Collaborated directly with banking clients to deliver prompt support, critical bug fixes, and feature enhancements.

Software Engineer
Dragons Bootcamp LLC

Apr 2024 – Nov 2024
Wyoming, United States (Remote)

- Developed a REST API using FastAPI and PostgreSQL to store data from learning management systems
- Explored ways to improve our learning platform by using state-of-the-art artificial intelligence

Software Engineer (Intern)
LevelUp ESG™

Apr 2024 – Jun 2024
City Of London, England, United Kingdom (Remote)

- Designed the architecture for the PDF generation subsystem, improving document processing efficiency
- Laid the foundation for performance optimization, resulting in improved system responsiveness

Software Engineer (Intern)
Dragons Bootcamp LLC

May 2023 – Dec 2023
Wyoming, United States (Remote)

- Assisted in developing the roadmap for Java-based backend programs, aligning with project goals and timelines
- Developed a full-stack web application using Spring Boot, React, PostgreSQL, and Docker

PROJECTS

aarty — Mini framework to render images in the terminals/ttys | *Image-rs, Rust, Just*

October 2022 – Present

lqth — Simple but blazingly fast screenshot utility | *Rust, Just, X11*

December 2023 – Present

todo2 — More advanced version of Rust's todo! macro | *Rust, Just*

September 2023 – Present

Ayah — plugin that displays verses from the Qur'an to Muslim developers | *Java, Gradle*

Augusts 2022 – Present

jqca — Simple java wrapper library for alquran-cloud API | *Java, Maven, Junit, Jackson*

July 2022 – Present

jls — Modern alternative to GNU/lis utility | *Java, Maven*

June 2022 – January 2023

jpwd — Modern alternative to GNU/pwd utility | *Java, Maven*
JColorfulConsole — Write a colorful text to the console | *Java, Maven*
pinterest-login — Login to Pinterest from rust | *Rust, Just*

June 2022 – July 2023
March 2022 – September 2023
September 2022 – Present

VOLUNTEERING

Open Source Developer

Jan 2017 – Present

github.com/0x61nas

Hybrid

- **image-rs**: use the built-in methods to convert the bytes between different representations [#2071](#)
- **cargo-bundle**: create a Linux module to improve the code structure [#130](#)
- **ockam**: show interactive menu to select one or more TCP intent when user doesn't specify [#6544](#)
- **ockam**: before sending the req to delete the TCP (outlet, inlet, listener) check that the target exists [#6553](#)
- **ockam**: support JSON output in the show subcommand [#6325](#)
- **halp**: add the support for custom URLs [#58](#)
- **halp**: refactor the config system [#62](#)
- **gpg-tui**: upgrade clap from v3 to v4 [#56](#)
- And [more...](#)

Nixpkgs maintainer

Jun 2024 – Present

github.com/NixOS

Remote

- The main maintainer for *flawz* package [#312751](#)
- The main maintainer for *tabiew* package [#315711](#)
- The main maintainer for *rustmission* package [#322474](#)
- And more [PRs](#), and [reviews](#).

TECHNICAL SKILLS

Languages: Rust, C, C++, Java, Python, SQL (Postgres), Bash, Lua, X86Assembly-Intel syntax, Java Script

Frameworks: Actix, Rocket, PyO3, JUnit, FastAPI, Spring Boot, Lombok, Yew, JPA, HTMX, Jackson, Image-rs, Serde, Clap, OpenGL, raylib, SOAP, Jakarta EE

Tools: Git, Cargo, Nix, Maven, Postgres, Just, GDB, ~~EL~~TeX, Make, QEMU, Docker, GitHub, GitHub Actions, GitLab, Vim, Helix, Z-Shell, Neovim, Tmux, Arch Linux, NixOS, PyCharm, IntelliJ, Cachix, HTML, CSS, GCP, Ubuntu, Debian, SSH, Sqlite, Clang, GCC, NASM, FASM, GnuPG, FFMPEG, farbfeld, Wireshark, JBoss, PlantUML

INTERESTS

Low-Level Programming: Passionate about working as close to the hardware as possible. Even with high-level abstractions, I always dive into the smallest details to understand how things work. I dislike black-box systems.

Performance Optimization: Dedicated to building high-performance, lightweight software and constantly learning new techniques to maximize efficiency.

Linux Systems: Advanced user of Arch Linux, Gentoo, and NixOS. I enjoy exploring and customizing Linux systems in my free time.

Programming Languages: Fascinated by exploring innovative ways to communicate with computers. I'm continuously refining my vision of the perfect programming language, waiting for the right moment to bring it to life.

Reverse Engineering: Well... nothing is closed-source if you can read assembly ;)

LANGUAGES

English: Professional

Arabic: Native