

Nduvho Edward Ramashia

063 853 3355 | Nduvho.Ramashia@gmail.com | Johannesburg
Github | LinkedIn

Professional Summary

Results-driven STEM enthusiast with a strong foundation in electrical engineering, information engineering, and programming. Committed to continuous learning and innovation, I bring a blend of technical expertise and collaborative problem-solving. Seeking to contribute to dynamic projects in the field with a focus on emerging technologies and a proven track record in successful software development projects.

Technical Skills

- Programming Languages:** C++, Python, Matlab, AVR Assembly, Javascript, “HTML/CSS”.
- Software Tools:** Matlab, LTspice, Linux (various distros and CLI operations), LOGO Soft Comfort, VS Code, Autodesk Eagle and Similar CAD Software, Git Version Control, Microsoft Excel, Power BI.
- Hardware Platforms:** Atmel AVR, ESP32, and STM32 Micro-controller families, LOGO PLC.

Experience

Assistant to the Services Manager, IMT Probe Kuruman Auto

December 2024 – January 2025

- Analyzed services data to identify trends and areas for improvement
- Streamlined data capture and analysis by developing an error-resistant, user-friendly job card entry form
- Evaluated departmental utilization and performance metrics
- Contributed to the development of cost-saving strategies using KPIs such as MTTR, MTBF and others

Junior Electrical Engineer (Part-time), iMining (Pty) Ltd

February 2024 – May 2024

- Measurement systems design and development
- PCB designs
- Firmware development
- Electronics equipment testing & assembly
- General engineering lab administration

Student Electrical Engineer, iMining (Pty) Ltd

December 2023 - January 2024

- Assisting engineers with Schematic & PCB designs
- Contributed in firmware development
- Electronics equipment testing & assembly
- General engineering lab administration
- Measurement systems design and development

Undergraduate Research Assistant, Wits School of Electrical and Information Engineering

June - July 2023

- Supported hands-on projects on controlled LED lighting for mosquito breeding
- Conducted experiments and collected data with attention to detail

- Ensured strict adherence to lab safety protocols
- Assisted in maintenance and repair of lab equipment

Volunteer, Data for Municipal Infrastructure Assets

June 2021 – August 2021

- Retrieved and processed data for road–river crossing assessments
- Evaluated infrastructure and prioritized repairs to optimize maintenance planning

Teaching Assistant, University of the Witwatersrand

Feb 2021 – June 2021

- Assisted groups and individuals in understanding Microprocessor concepts
- Supported students with software setup and debugging Assembly code

Lecturer Assistant, Wits – School of Electrical and Information Eng.

Nov 2020 - Feb 2021

- Tested and analyzed new microcontrollers for future academic use
- Implemented and validated upcoming lab exercises on proposed hardware
- Reviewed lab instructions for accuracy, feasibility, and time efficiency

Education

Bsc(Hon) in Electrical and Information Engineering,

University of the Witwatersrand, Johannesburg

4th Year

Expected Grad. Date: 2025

Achievements and Awards

- Triumphs in High-Performance Computing (HPC) and Data Science Competitions:
 - ✓ Secured a coveted spot on the CHPC team for ISC22-SCC in 2022.
 - ✓ Distinguished with a stellar 2nd place out of 4 finalists in the CHPC-SCC competition in 2021.
 - ✓ Showcased exceptional skills, clinching an impressive 2nd place out of 9 participants in the spirited DIRISA DATATHON of 2020.

Certifications

The Cybersecurity Threat Landscape, LinkedIn Learning, 2023

Leadership and Extracurricular Activities

- Music Enthusiast:
 - Proficient in playing electric piano and bass guitar.
 - Actively involved in musical collaborations.
- Gaming Enthusiast:
 - Engaged in gaming communities and online tournaments.
 - Demonstrated strategic thinking and teamwork through gaming experiences.

Professional Memberships

- Student Member, South African Institute of Electrical Engineers (SAIEE)
- Subscriber, Creamer Media (Engineering News, Mining Weekly)