

NETANEL MAZUZ

Hardware & Software Engineer | AI Developer

☎ 054-9329282 @ netanel.mazuz@outlook.com 🔗 [Linkedin.com/in/netanel-mazuz](https://www.linkedin.com/in/netanel-mazuz) 📁 Portfolio

SUMMARY

Looking for a challenging and interesting **Full-Time** position in AI **Development**.

EXPERIENCE

Project Advisor

RoboPhysics 📅 2023 - Present 📍 Technion, Israel

Mentoring students in **robotics** and **physics** projects, ensuring their eligibility for honors graduation, academic candidacy, and possible selection for elite IDF units.

- Mentored 10 teams of 3-4 members, 70% of which **received awards** for their **exemplary performance**, originality, perseverance, and academic excellence.
- I promote independent work, collaboration & interdisciplinary critical thinking.

Cad Engineer

Nvidia 📅 2022 - 2023 📍 Yokneam, Israel

Coded **CAD Python** tools for **DFT** teams, incorporated new checkers for Nvidia's netlists, covering all algorithm dev. stages from research and implementation to testing, debugging, and deployment, using **CI/CD** and **Agile** methodologies.

- Conducted design reviews, produced documentation and status reports, and provided technical support for the software and tools I developed.

Automation Engineer

Inuitive 📅 2020 - 2022 📍 Ra'anana, Israel

Programmed object-oriented **C++** and **Python** automated tests for a **computer vision** chip. I integrated software for learning algorithms embedded in the chip.

- I conducted unit, end-to-end, performance, and regression testing to ensure robust quality assurance and reliability throughout the development lifecycle
- Cut testing runtime by 30% using design patterns in automation pipelines

EDUCATION

AI Development Training

Technion University 📅 2024

- Hands-on experience with leading deep learning frameworks, including the design, training, validation, and optimization techniques for neural networks.
- Covering math & stats foundations, learning architectures and building blocks.
- Built 2 large **AI projects** with 2 peers, prioritizing use-case-oriented thinking.

Full-Stack Development Bootcamp

Appleseeds Academy 📅 2020

- Created dynamic, responsive websites, UIs, and robust, scalable applications.
- Applied full-stack tools, frameworks, databases, and industry best practices.

B.Sc. in Electrical & Computer Engineering

Ben-Gurion University 📅 2015 - 2020

- Majored in **VLSI**, data structures & algorithms, and **signal processing**.
- **Final Project:** Arduino-Based IoT Water Nitrate Pollution Monitoring System.
- **Notable Project:** a blind source separation **Matlab** project, denoising signals.
- Coded over 50 projects in C/C++ in Visual Studio. **D&D OOP project** (Grade: 97)

EXTRACURRICULAR ACTIVITIES

BGU Racing Team

Formula Student 📅 2016 - 2017

Participated in developing an electric racing car, designed and integrated the BMS according to specifications under challenging power consumption, heat dissipation, space, cost, and performance constraints.

MILITARY SERVICE

Army police

Full service as a squad commander.

LANGUAGES

Hebrew | English

PROJECTS

AI-Powered Speech Emotion Recognition

Designed an **emotion classification** model using CNN.

- Achieving 99% accuracy on Ravdess, Crema, Savee, and Tess datasets using GPU-accelerated libraries.

Deep Fake Detection System in Video




Developed and implemented a **deep fake detection** AI system to identify and mitigate synthetic media risks.

- Delivered an innovative solution for preprocessing large datasets, cutting training time by 24x.

Hackathon - Accessibility Project

Built **server-side** and **client-side** for a children's stories translation website. Led a 5 developers team, planned, organized, and enforced tight schedule (24 hours).

TOOLS & TECHNOLOGIES

- **Software & Hardware Languages**
Python | C | C# | C++ | JS | HTML | CSS
VHDL | Verilog | Spice | TCL | Shell
- **Machine & Deep Learning**
PyTorch | CUDA | Keras | TensorFlow | DGL
Scikit-learn | XGBoost |
- **IDE's & Frameworks**
VSCode | PyCharm | Jupyter | Visual Studio
Matlab | React | Angular | Express.js
- **DevOps and Version Control System**
Git | SVN | Perforce | Jenkins | Docker | Jira
- **Operating Systems**
Windows | Linux | Unix | Android
- **Communication Interfaces**
UART | PCIe | I2C | SPI | RESTful API

CERTIFICATIONS

LinkedIn Training certificates

SED | AWK | RegEx | Pandas (+Advanced) | Seaborn
NumPy | SciPy | Matplotlib | Pytest

VOLUNTEERING

Coordinator

Tamar Regional Council at 'Dead Sea' hotels

📅 2024

I assisted evacuees in coordinating with government bodies, organized activities, provided updates, and aligned system resources with evacuees' needs.

Web Developer

Starter Digital

📅 2016 - 2018

Developed websites promoting small businesses in Israel, endorsed by Google & Wix. **LinkedIn Page**.