

Idan Arbiv

Deep Learning Researcher and hands-on Software Engineer.

Education

M.Sc. Computer Science/ Ben Gurion University/ GPA - 97

Estimated graduation year – 2026.

Deep Learning Researcher under the guidance of Dr. [Omri Azencot](#), I focus on **Deep Learning** in the areas of **Sequential Modeling, Unsupervised Learning, and Representation Learning**.

Publications

- *N. Berman*, I. Naiman*, I. Arbiv*, G. Fadlon*, and O. Azencot. Sequential Disentanglement by Extracting Static Information From A Single Sequence Element. International Conference on Machine Learning (ICML), 2024*
- *N. Berman*, I. Naiman*, I. Arbiv*, G. Fadlon*, Itai Pemper*, and O. Azencot. Utilizing Image Transforms and Diffusion Models for Generative Modeling of Short and Long Time Series. Neural Information Processing Systems (NeurIPS), 2024*

B.Sc. Computer Science/ Ben Gurion University /GPA – 93 (Summa Cum Laude, Dean's List)

Experience

AUG 23 –PRESENT

Algorithm Engineer (Student) – CTO Group/ SONY Semiconductor

- Developed Web **LLM-based** applications using **RAG** architecture using **Chroma, LangChain, and Streamlit**. overseeing the entire process from design and architecture to development, testing, **CI/CD using TeamCity**, and deployment.
- Created a web-based internal **search engine** using the **ELK Stack (Elastic Search, Kibana)** and **web scraping methods**, managing all stages from initial design to production using **Jira, Git, Bitbucket**.
- Built a **Python package for interactive plot visualization** based on the Matplotlib package, enhancing data analysis capabilities.
- Developed a Python-based **desktop application** for chip power consumption analysis using **Tkinter and Pandas**.
- Improved the algorithmic **5G simulation code architecture**, facilitating the development of new **algorithms** for chip design and ensuring robust CI/CD processes and production deployment.

OCT 23 –PRESENT

Teaching Assistant/ Ben Gurion University

- CS 202.1.2051 - Principles Of Programming Languages (Spring 2024)
- CS 202.1.5391 - Distributed Systems Programming (Winter 2024)

MAY 22 –AUG 23

Software Engineer (Student)/ SONY Semiconductor

- Developed testable, scalable, and maintainable code for new and existing software for cellular **IoT applications**, utilizing **OOP, SOLID principles**, and **design patterns** in **desktop applications** using **Java**.
- Developed new software functionalities using **Java and Spring Boot framework** on the server side, as well as **databases management**, leveraging my understanding of various algorithms.
- Worked on the client-side using **React and Redux**, creating dynamic and responsive UI components that enhanced user experience while employing analytical tools for optimal results.

NOV 15 – AUG 20

Communications (C4I) Officer - Captain / IDF

- Responsible for all **communication and technology systems** in a variety of **combat and special units**. Command of **over 40 soldiers, 15 officers, 5 noncommissioned officers**, demonstrating strong **leadership** while leading the units to success in a variety of operational missions in different arenas, including special missions abroad. Received **excellence certificate** for performance.