

EXPERIENCE

Redcare Pharmacy | *Working student*

Aug 2023 - Present

- **KIM-broker API**: Developed tools to streamline the processing of KIM and TIM messages into the RabbitMQ server, enhancing message handling efficiency.
- **eRX Progression**: A script to automate daily reporting on e-prescription usage and active pharmacy activity in the RCP, delivering data insights and analysis to the team.
- **Requirement engineer**: Designed and implemented various tools and scripts to optimize data processing, improving team efficiency and workflow automation.

EDUCATION

RWTH Aachen University | *B.Sc Computer Science*

Oct 2022 – Present

- **Expected Graduation**: Oct 2025

PROJECTS

RBMK Reactor Simulation

- Develop a simulation of Chernobyl's RBMK nuclear reactor using **SFML** and **OpenMP** in C++.

HPC Application

- Develop multiple HPC application utilizing **OpenMP** and **CUDA** for CLIAx-23
- Spmvx: Sparse matrix vector multiplication. Implemented in CRS format with **NUMA** node optimizations.
- MergeSort: Designed and executed nested OpenMP tasks for parallel mergesort.

SPOS

- Developed a custom operating system for the ATMEGA664 microchip using the **AVR** library in C.
- Integrated features like a scheduler, heap/stack memory management, and custom drivers.

Blade defects detection

- Designed a program to detect defects on shaving blades (Philips) using **OpenCV**. **2nd Place** in the Fraunhofer Hackathon 2023

Asclepius

- Led the development of an AI model to translate ASL to English text using Mediapipe and **TensorFlow**. **1st Place** at the **APAC Microsoft Hackathon 2022**

SPACE AC | *Software Engineer*

Oct 2020 - Mar 2022

- **SPOROS**: Develop a CanSat with 2 autorotating payload and groundstation. With the Cansat acting as a relay hub for the payload increasing the communication range in **Anual Cansat competition 2021**, **3rd place**.
- **Passenger balloon**: Develop a High altitude weather balloon satellite with long range communication designed to collect data at the peak altitude of 28 km and 40 km.
- **Alien Cansat**: Develop a CanSat that operate with FLIR's thermal camera design collect data for analysing the correlation of pm2.5 and heat.

TECHNICAL SKILLS

- **Language**: Python, C/C++, Java, Typescript/Javascript, HTML, CSS/SCSS, Haskell, SQL, Postgresql
- **Framework**: CMake, CUDA, OpenMP, MPI, NumPy, Pandas, React, Next.js, Node.js, Prisma.js
- **Tools**: Git, Github/Gitlab, Neovim, Docker

LANGUAGE

- **Thai**: Native speaker

English: C2 proficiency

German: C1 proficiency