### Shakhzod Shermatov

GitHub | LinkedIn | sshermatov50@gmail.com

python, php, javascript

### **Experience**

## Software Engineer, akeon GmbH

Sep 2024 - June 2025

### Recorder App

- o Implemented FFmpeg audio processing backend converting WebM to MP3 with auto-cleanup
- o Built a multi-token auth system with SHA-256 hashing & SameSite cookies with device-based session expiry.
- o Developed a MIME-based email system for audio and text attachments with SMTP auth

# **LMS** (Learning Management System for CBZ)

- Developed a feature to register course participants, including form validation and ACF integration
- o Created a course statistics module to track user engagement and visualize performance data.
- o Developed a dynamic search functionality for students and courses, enabling real-time filtering
- o Implemented a student assignment system that checks student existence before enrollment or removal.

#### Education

42 Berlin (Coding School), Clanguage

Feb 2023 - Nov 2023

- <u>Libft</u>: Coded 42 functions in C that work the same as the original ones
- o get next line: Reads the text from a file descriptor line by line until the end.
- ft\_printf: A function that behaves the same as "printf" in C.

Riga Technical University, BSc. Economics

Sep 2019 - Jun 2022

- GPA 6.7/10, Winner of 2 Erasmus+ scholarships for studies
- Universidade do Minho: Predictive Data Analysis, Power Bl
- o Istanbul Technical University: Fundamentals in Python

### Oct 2021 - Feb 2022

Feb 2021 - Jun 2021

#### **Projects**

## **Essential Words** (essential-words.uz)

- Built an interactive online platform to learn German and English words
- o Integrated TTS for British and American pronunciation, caching audio with AWS S3 for loading efficiency.
- 0 Developed backend with Django to handle question storage and retrieval from database
- Created database with MySQL to efficiently store and retrieve over 200 vocabulary arrays
- o Implemented IndexedDB to improve efficiency by caching the data

Tech Stack: Django, MySQL, AWS S3, IndexedDB, JavaScript (TTS API)

## **Extract Links (Real-Time Web Crawler)**

- o Developed a Flask-based web crawler that extracts links from websites in real time.
- o Implemented Server-Sent Events (SSE) to stream discovered links with status code live to the frontend
- Developed a dynamic frontend with a progress bar and live updates for enhanced UX.

Tech Stack: Flask, BeautifulSoup/Requests, SSE, JavaScript, HTML/CSS

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