ABDULLAH AL-METWALLY

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EDUCATION

Bachelor of Computer Science, George Mason University

2022 - 2025

Relevant Coursework: Data Structures and Algorithms, Software Analysis, Artificial Intelligence, Formal Models and Methods, Database Concepts, Operating Systems, Algorithms Analysis

SKILLS

Programming Languages Tools and Frameworks Python, Dart, Javascript, CSS, HTML, Bash, Java, C

Firebase, Flutter, VsCode, Vue.js, Node.js, ThreeJs, React, React Native, Git, Github iOS, Windows, Linux, MacOS, Unix

Operating Systems iOS, Windows, Line

EXPERIENCE

MoneyFlap

Sacramento, CA

Software Engineer Intern

May 2024 – Present

- Developed **cross-platform mobile applications** using **Flutter** with scalable state management through **BLoC**.
- Integrated secure payment solutions using Deno and TypeScript, ensuring data security and transaction reliability.
- Employed Agile practices to deliver iterative improvements, resulting in 26,000+ waitlist signups.
- Established seamless communication between frontend and backend using serverless architecture and cloud functions.

Krasnow Institute

Fairfax. VA

Software Engineer Intern

October 2023 - May 2024

- Spearheaded the development of an algorithm to uniquely identify and link neuron sets, enabling targeted memory retrieval.
- Revolutionized neuroscientific approaches to **memory access**.
- Contributed to research teams at the intersection of **cognitive psychology**, **neurobiology**, and **AI**.
- Applied advanced data structures to enhance computational efficiency by 40%.

Sayhan Consultants Inc

Lorton, VA

Software Engineer Intern

May 2022 - September 2022

- Engineered a **sophisticated internal web platform** to parse, validate, and format complex user data into structured files, automating **data workflows**.
- Developed an intuitive, responsive user interface using HTML, CSS, JavaScript, and React.
- Integrated Firebase DB for secure real-time data storage, improving data retrieval speed by 30% and ensuring 99.9% uptime.

PROJECTS

Drum Jungle — Tailwind CSS, JavaScript, HTML, Shazam API

December 2023

- Built a music streaming web platform with search functionality and genre sorting.
- Integrated the Shazam API to retrieve songs and tailored the interface using Tailwind CSS.

Ride Along — Flutter, Dart, FirebaseDB, Google's Geolocation API

March 2024

- Developed a motorcycle social network app with group rides, multi-factor authentication, user data management.
- Utilized Google's Geolocation API to provide location-based services for users.

Personal Portfolio — Three.Js, Next.Js, FramerMotion, React.Js, TailWind CSS

August 2024

- Built a dynamic portfolio website featuring 3D models and interactive animations
 - Implemented state management and animations using hooks, Framer Motion, integrated EmailJS for contact forms
 - Implemented custom camera controls for interactive 3D scenes, allowing users to explore models