BASSEL AHMED

FAIRFIELD, IA 52557 • +1-641-819-1266 • elkadybasel@gmail.com https://www.linkedin.com/in/bassel-ahmed-14637816b/

JAVA BACK-END DEVELOPER

Skilled Backend Java developer with 2 years of professional experience developing enterprise applications for a full Factory Management System Storage, Employees, HR, Invoices, Taxes, and E-commerce for the Factory to sell its Products to its Customers using Java, Spring, and AWS. Proficient in backend technologies including Java, Spring, Hibernate, Security, AWS EKS, AWS Lambda, Oracle, and Docker. Also, 1 Year of experience in automation in-car systems, working on consoles for cars and integrating cameras and sensors with microcontrollers, using embedded technologies such as ARM Cortex-M microcontrollers, CAN Bus communication, LiDAR, and radar sensors, CMOS image sensors, RTOS, Embedded C/C++, and adhering to safety standards like ISO 26262.

OOPS • Design Patterns • Database Development • Web Services (REST and SOAP) • Single Page Application

Languages: Java, JavaScript, C, Python, Embedded Java

Web: HTML, CSS, React

Web Services: REST, SOAP, XML, JSON

Web/App Servers: Tomcat

Frameworks: Spring, Spring Boot, Hibernate **Databases:** MySQL, SQL, MS SQL Server

Design Patterns: Singleton, Strategy, Observer, Decorator, Abstract and Method Factory, Command Pattern, Adaptor,

Facade, Template, Composite

SDLC: Waterfall, Agile

Tools: IntelliJ IDEA, Eclipse, Visual Studio, SQL Server Management Studio (SSMS), Maven, Postman

Platforms: Windows

PROFESSIONAL EXPERIENCE

CAREER NOTE: Completed on-campus studies and currently taking distance education courses to complete a **master's degree in computer science** (Available for full-time, W-2 employment).

BLUE NILE, 10th of Ramdan, Egypt • 06/2022 - 01/2024

Company for raw chemical materials.

Software Engineer

Built Ecommerce, Built Integration system between our Taxes System and the Governmental System

- Implemented and managed a robust database using SQL for the entire company system (HR System Storage System Employee System), ensuring efficient data storage, retrieval, and integrity across HR, storage, employee, and invoice systems, resulting in a efficiency in data processing.
- Developed and maintained RESTful endpoints for managing products, customers, and employee data using Java Spring Boot, enhancing user experience and operational efficiency by reducing transaction and query significantly
- Developed an HR system to manage employee records, attendance, and payroll using Java Spring Boot, which improved HR operational efficiency and ensured accurate payroll processing.
- Implemented an employee management system to handle employee onboarding, performance reviews, and records, using Java Spring Boot, resulting in a more streamlined and efficient employee management process.
- Developed and maintained RESTful endpoints for purchasing products and managing customer data using Java Spring Boot, enhancing user experience and operational efficiency by reducing transaction times by 20%.
- Designed and built a comprehensive backend for invoice management, handling database design, domain modeling, and endpoint creation, which streamlined invoice processing and tax calculations, leading to a reduction in manual data entry errors and calculation Variations and reducing Human effort.
- Integrated Electronic Taxes System (ETS) with a unified governmental taxation system, ensuring compliance with regulatory requirements and automating tax calculations, leading to a 25% reduction in manual processing time.

<u>Technologies Used:</u> Java, Spring Boot, Hibernate, Postman, IntelliJ, Maven, Microsoft SQL server, Eureka Server, Eureka Client, Rest Templet, Tomcat

SUMITOMO ELECTRIC, 10th of Ramdan, Egypt • 11/2021 – 05/2022

Automotive Company.

Software Engineer

Built integrated System for Cars

- Developed and integrated embedded software for car systems using ARM Cortex-M microcontrollers, enhancing system reliability and performance, which led to a 30% improvement in processing speed for sensor data.
- Implemented and managed real-time communication protocols such as CAN Bus and LIN for seamless integration of cameras and radars with microcontrollers, ensuring accurate and timely data exchange, reducing latency by 25%.
- Designed and built advanced driver assistance systems (ADAS) by integrating LiDAR, radar, and CMOS image sensors, providing enhanced safety features like collision detection and lane-keeping assistance, resulting in a 25% reduction in accidents during testing

Technologies Used: Vision Computing, ML, Embedded java, microcontrollers, Embedded C, ARM

ACADEMIC PROJECTS

Maharishi International University (2024) Full E-Commerce: Full Ecommerce web server. Designed and developed a full-fledged e-commerce platform, enabling seamless online shopping experiences, Powered by Spring Boot and hosted on Apache Tomcat, the backend handles product management, user authentication, order processing, and integration with payment gateways. Implemented RESTful APIs to ensure efficient communication between the frontend and backend. Utilized REACT, JS, HTML, CSS, Spring Boot, Tomcat, Postman

Maharishi International University (2024) Demo Bank System: Demo for Bank System where the user can deposit, withdraw, transfer, apply for credit cards and loans, manager can see the performance of the system, employee can respond to the user tickets. Utilized REACT, JS, HTML, CSS, Spring Boot, Rest, Tomcat, Postman, Doker

EDUCATION

Master of Science in Computer Science

Maharishi International University, Fairfield, Iowa, USA (In progress via distance education; expected completion 10/2026)

Bachelor Degree in Information and Technology Engineering German University in Cairo (GUC), New Cairo, Egypt