

# ELSHA AMALIA PUSPONEGORO

089673142013 | elshaaml14@gmail.com | www.linkedin.com/in/elshaamalia | https://github.com/elshaamalia

Perumahan Pantai Gading, Batam, Kepulauan Riau.

## PROFILE SUMMARY

Informatics Engineering student at State Polytechnic of Batam specializing in Web Development and Artificial Intelligence. Proficient in Laravel, Python, and JavaScript with hands-on experience in academic projects. Demonstrates strong time management skills through successful balance of academic and professional commitments.

## EDUCATION

State Polytechnic of Batam - Batam

2023 - 2026

D3 Informatic Engineering

Status : Active Student

## WORK EXPERIENCE

PT Giken Precision Indonesia | IT Engineer (Internship)

Batam | March 2025 - Nov 2025

- Developed and implemented a production process monitoring system to improve efficiency and data accuracy
- Conducted testing, troubleshooting, and adjustments of machine programs and circuits before implementation on the production line.
- Entered and managed equipment data to support the monitoring system and reporting.
- Assisted with quality control and preventive maintenance of production machines to ensure compliance with safety and quality standards.

## PROJECT EXPERIENCE

Internship Project | PT Giken Precision Indonesia

IoT-Based Real-Time Cycle Time Monitoring System

March 2025 - Sep 2025

- Designed and developed a real-time production cycle time monitoring system for screw, function test, and labelling processes.
- Integrated ESP32 microcontrollers with machine sensors and developed Arduino programs to read and transmit machine signals.
- Implemented a Node.js/Express.js backend with WebSocket to receive data and update the web dashboard in real time.
- Created a responsive web interface to visualize cycle time data and identify process bottlenecks.
- Conducted testing, troubleshooting, and adjustments before deployment to the production line.

Project Based Learning | State Polytechnic of Batam

Health and Fitness Evaluator AI

February 2025 - July 2025

- Designed the system architecture, prepared use case diagrams, activity diagrams, and other technical documentation.
- Developed the frontend interface using modern web technologies
- Built and integrated AI models for health and fitness evaluation, including XGBoost Regressor for predictive analysis and NLP components for text input processing.
- Collaborated with the team on testing and implementation to ensure alignment with requirements.
- Created promotional and presentation posters for project showcase.

Automatic Transcription Website

August 2024 - January 2025

- Developed responsive frontend interface using TailwindCSS
- Built backend system for user authentication and AI model management with Laravel
- Implemented and integrated AI models for speech-to-text, diarization, and summarization features
- Created technical documentation including system flowcharts and requirements specifications
- Designed project promotional posters using Canva

- Designed intuitive user interface using Figma
- Developed responsive frontend components with HTML, TailwindCSS, and JavaScript
- Ensured cross-platform compatibility for optimal user experience
- Prepared technical documentation and UML diagrams for system development

*E-commerce Website*

August 2023 - January 2024

- Compiled comprehensive functional and non-functional requirements documentation
- Designed UML diagrams including use cases, activity diagrams, and class diagrams
- Analyzed and documented business flows and system processes
- Conducted functional testing and created test case documentation
- Collaborated with development team to ensure implementation aligned with specifications

## SKILLS

---

- **Software Skills** : Github, Visual Studio Code, Arduino IDE, Canva, Figma, Draw.io, Microsoft Office.
- **Soft Skills** : Teamwork, Adaptability, Problem Solving.
- **Language** : Indonesia (Native), English (Intermediate).
- **Programming / Framework** : Python, Laravel, React.js, Express.js, Tailwindcss.