

HIDAYAT NUR HAKIM

082211562536 | hidayatnurhakim2412@gmail.com | <https://www.linkedin.com/in/hidayat-nur-hakim> | <https://www.hidayatnur.site>

Final-year Informatics student at Universitas Syiah Kuala and a Fullstack Developer with 1.5+ years of experience delivering high-performance web applications across government, healthcare, and educational sectors. JS/ TS, Java, Next.js, Node.js, etc., complemented by backend experience using FastAPI for RAG-based AI, RBAC, and RESTful API development. National Finalist at LIDM 2025 and INFEST XI, 2nd Winner of INFINITERA 1.0, and Top 20 Best Capstone at DBS Foundation 2025. Proven ability to execute digital transformation projects like BUKADITA (PPM-TTG), supported by a solid understanding of Software Architecture and DevOps through technical mentorship as a Teaching Assistant at USK. I am committed to delivering scalable, production-ready applications that drive real-world digital innovation.

Work Experiences

Coding Camp by DBS Foundation - Jakarta, Indonesia

Feb 2025 - Jul 2025

Front-End and Back-End Developer Cohort (Remote)

- Developed "PurrPal," an AI-powered health platform, achieving a Top 20 National ranking from 398 competing teams.
- Engineered a high-performance frontend using Next.js and TypeScript, securing a 95+ Lighthouse score for optimal speed.
- Architected scalable RESTful APIs with Express.js to manage health data for a seamless client-server communication.
- Designed intuitive, mobile-first interfaces in Figma, resulting in a Top 5% recognition for superior user experience.
- Integrated advanced Google Gemini AI features to automate health consultations, significantly enhancing platform interactivity and innovation.
- Collaborated within an Agile/Scrum framework using Git/GitHub, ensuring 100% on-time delivery of complex project milestones.

Dinas Komunikasi, Informatika dan Persandian Aceh - Banda Aceh, Indonesia

Aug 2025 - Sep 2025

AI Engineer Intern (On-site)

- Engineered "LawChain," an AI-driven RAG prototype, to automate legal queries regarding the Indonesian Constitution (UUD 1945).
- Architected a scalable FastAPI backend, achieving a clean separation of concerns and optimizing system response performance.
- Implemented Retrieval-Augmented Generation (RAG) technology to eliminate AI hallucinations, ensuring 100% grounded legal context.
- Optimized LLM performance by integrating Google Gemma 2:2b and LLaMA 3, refining response accuracy and latency.
- Developed a functional proof-of-concept for government digital services, streamlining public access to complex legal documentation.
- Conducted technical research on vector databases to manage constitutional data, enhancing the reliability of AI-generated answers.

Universitas Syiah Kuala - Banda Aceh, Indonesia

Aug 2025 - Dec 2025

Full-Stack Developer (PPM-TTG Program) (On-site)

- Launched "BUKADITA," a digital health platform, successfully modernizing Posyandu operations through a cross-disciplinary USK Grant initiative.
- Engineered the entire platform using Next.js and Express.js, transitioning 100% of manual paper-based records into a digital system.
- Designed an accessible Figma interface tailored for village health cadres, significantly reducing data entry errors and learning curves.
- Integrated a Progressive Web App (PWA) architecture to ensure 99% system availability and easy mobile access for field workers.
- Facilitated on-site technical workshops for 25+ health cadres in Kopelma Darussalam, ensuring high technology adoption and digital literacy.
- Collaborated with healthcare professionals to align digital solutions with national health goals (RPJMN 2025–2029) for community impact.

Universitas Syiah Kuala - Banda Aceh, Indonesia

Sep 2025 - Dec 2025

Teaching Assistant - Software Architecture (On-site)

- Mentored over 100+ students in transforming complex business requirements into technical specifications using UML and OCL models.
- Managed specialized lab sessions focused on implementing Creational, Structural, and Behavioral design patterns for scalable systems.
- Facilitated the drafting of Requirements, Facts, and Assumptions (RFA) documentation to ensure a robust system development foundation.
- Conducted architectural reviews for 20+ team projects, providing constructive feedback on system efficiency and structural integrity.
- Evaluated student implementations of advanced architectural patterns, ensuring alignment with industry-standard software engineering benchmarks.
- Bridged the gap between theoretical software structures and practical application through hands-on coding demonstrations and case studies.

Universitas Syiah Kuala - Banda Aceh, Indonesia

Sep 2025 - Dec 2025

Teaching Assistant - Software Development and Operations (On-site)

- Led practical lab sessions for 30+ students, covering fundamental to advanced topics including Git/ GitHub, OOP, and Docker containerization.
- Demonstrated and supervised the implementation of automated CI/CD pipelines using GitHub Actions, achieving 100% deployment

automation for student projects.

- Mentored 20+ student teams through the full SDLC, from Scrum methodologies (sprint planning/backlog) to successful final product demonstration
- Developed industry-relevant lab materials and case studies in collaboration with faculty to strengthen students' grasp of modern DevOps concepts.
- Evaluated technical implementations and Git workflows for final projects, providing constructive feedback to ensure 95%+ alignment with industry benchmarks.
- Trained students on high-demand industry tools, including Grafana for system logging/monitoring and Google Cloud Platform (GCP) for infrastructure.
- Bridged the gap between academic theory and professional practices, preparing students with the essential technical skills for the modern digital workforce.

Education Level

Universitas Syiah Kuala - Banda Aceh, Indonesia

Aug 2022 - May 2026 (Expected)

Bachelor of Informatics (Computer Science)

- National Finalist at LIDM 2025 – Digital Education Technology Innovation Division.
- National Finalist at INFEST XI 2025 – Hackathon Competition (GajiBersih Project).
- 2nd Winner at INFINITERA 1.0 – National Web Programming Competition 2025.
- Top 20 Best Capstone Project at DBS Foundation – Coding Camp 2025.
- Teaching Assistant – Software Architecture and DevOps Courses (Informatics Dept).
- Head of Department – Student Welfare Management at HMIF USK (2025 – Present).

Organisational Experience

Himpunan Mahasiswa Informatika USK (HMIF) - Banda Aceh, Indonesia

Feb 2025 - Mar 2026

Head of Student Welfare Management Department

- Led a strategic department of 14 active staff members across two divisions: Student Aspirations and Women Empowerment.
- Managed the end-to-end execution of 5+ departmental programs in "Kabinet Beyond," ensuring 100% alignment with organizational welfare goals.
- Directed the Student Aspirations division to bridge communication between 500+ informatics students and the faculty administration effectively.
- Cultivated a high-performance work culture through weekly coordination, resulting in a 90% staff retention and engagement rate.
- Optimized departmental budget and operational efficiency, ensuring all initiatives were delivered with a tangible impact on student well-being.
- Supervised cross-functional collaboration between organizational units to streamline large-scale campus events and welfare advocacy programs.

Himpunan Mahasiswa Informatika USK (HMIF)

Feb 2024 - Feb 2025

Staff of Student Welfare Management Department

- Organized and executed multiple departmental welfare initiatives, contributing to the enhancement of campus life for informatics students.
- Collaborated with a team of 10+ staff members to maintain a harmonious work environment and ensure program delivery excellence.
- Contributed to the successful implementation of student advocacy programs, assisting in data collection and community outreach efforts.
- Maintained effective communication channels within the team to ensure smooth coordination during high-pressure event execution.

Projects

- **[Competition] ADAPTIVIN National Finalist LIDM 2025: ADAPTIVIN: RULE- BASED ADAPTIVE LEARNING SYSTEM FOR IDENTIFYING LEARNING DIFFICULTIES AND PERSONALIZED MATHEMATICS RECOMMENDATIONS FOR ELEMENTARY STUDENTS** 🏆 (2025): National Finalist at LIDM 2025 (ITDP Division) recognized for bridging the numeracy gap through data-driven personalization. Engineered a Level 1-5 adaptive engine and integrated Google Gemini AI using Next.js 15 and Express.js to provide real-time misconception analysis. Validated at SDN 16 Banda Aceh, the platform achieved an 89.6% student satisfaction rate and measurable improvements in teacher formative assessment efficiency.
- **[PPM-TTG] BUKADITA: DESIGN AND CONSTRUCTION OF A DIGITAL CADRE BOOK WEBSITE (BUKADITA) FOR LEARNING AND MONITORING THE LEARNING PROCESS OF POSYANDU CADRES IN KOPELMA DARUSSALAM VILLAGE** 🏆 (2025): Full-Stack Developer for the PPM-TTG National Grant program, modernizing maternal and child health monitoring through a Next.js & Express.js platform. Engineered a PWA-based system with Multi-Tier Authorization for health cadres, successfully digitizing 100% of manual records at Gampong Kopelma Darussalam. Recognized by local health authorities (Puskesmas) for accelerating digital literacy and improving grassroots healthcare data reporting efficiency.
- **[Internship] PURRPAL: AI-Powered Cat Healthcare Ecosystem** 🏆 (2025): Best Capstone Team at DBS Foundation (Top 20 of 398 teams). As Lead Front-End Developer, engineered a high-performance Next.js & TypeScript platform with a 95+ Lighthouse score.

Integrated Google Gemini AI for real-time consultations and Multi-Model ML (Vision & Tabular) for veterinary symptom detection, delivering a mobile-first, scalable pet-tech solution for the Indonesian market.

- **[Competition] VELORA: Award-Winning Maternal Health AI Ecosystem** 🏆 (2025): 2nd Winner of INFINITERA 1.0 National Competition. Engineered an integrated health monitoring platform with 84.21% AI prediction accuracy for pregnancy risks using Python ML. Achieved a 95+ Lighthouse and 100 SEO score, featuring enterprise-grade security with end-to-end encryption. Transformed the traditional Buku KIA into a high-performance digital companion for safe, data-driven maternal health management.
- **[Competition] GAJIBERSIH: AI-Powered Legal-Tech Ecosystem** 🏆 (2025): National Finalist at INFEST XI Hackathon. Engineered a Next.js & Express.js platform integrating OpenAI API for automated PDF/DOCX contract analysis to identify labor risks. Developed a transparent financial engine for PPh21 and BPJS calculations in compliance with Indonesian labor regulations. Built an interactive "Ask AI" assistant to provide real-time legal insights, bridging the gap in labor literacy for the Indonesian workforce.
- **[Internship] LAWCHAIN: RAG-Based AI Legal Assistant** 🏆 (2025): AI Engineer Intern at KOMINSA Aceh. Developed a Retrieval-Augmented Generation (RAG) prototype using FastAPI to automate legal queries regarding the Indonesian Constitution (UUD 1945). Optimized accuracy by integrating Google Gemma 2:2b and LLaMA 3, effectively eliminating AI hallucinations and modernizing public access to legal documentation.