

Atharve Dahima

✉ atharveeee@gmail.com 📞 +91-9983974154 📁 Portfolio 🔗 LinkedIn 🐙 GitHub 🏛️ Rashtriya Raksha University, Gujarat

Summary

Electronics Engineering student passionate about building real systems from autonomous drones to LiFi communication networks. Experienced in embedded hardware, computer vision, and PCB design, with a long-term interest in cryogenic electronics and quantum computing

Employment History

- Intern-2026 📌 **Design and Analysis of Laser Based LiFi Network for Indoor Wireless Communication** - Prof. Ravi Maddila, MNIT Jaipur
- Simulated a laser-based Light Fidelity (LiFi) communication system to improve indoor wireless communication speed, increase signal quality, and reduce the Bit Error Rate (BER).
 - Analyzed system performance using OptiSystem software by simulating components such as a Continuous Wave (CW) Laser, Mach Zehnder Modulator (MZM), and a Low Pass Chebyshev Filter.

Publications

- 2026 📌 **Annotation-Free Fitness Grading of Nigerian Naira Banknotes via Pretrained Feature Clustering** - 2026 8th IEEE Symposium on Computers & Informatics (ISCI 2026)
Accepted for presentation; Concorde Hotel, Kuala Lumpur, Malaysia.

Projects

- 2025 📌 **Lead Developer - F450 Multirotor Drone**
- Built a complete F450 quadcopter from scratch, integrating hardware components and tuning PID algorithms for stable flight performance and signal reliability. Achieved 20-minute flight time.
 - Integrated computer vision (OpenCV, Python) with autonomous flight logic via ArduPilot, enabling real-time face recognition and subject tracking (90% accuracy) for disaster-response use cases.

Hackathons & Achievements

- 2026 📌 **State Finalist - Technovation Hackathon 2026**
Led a team to design and build a face-detection drone using carbon fibre and 3D printed components, competing at state level.

Skills, Tools & Certifications

- Technical 📌 Raspberry Pi, ESP32, Arduino, UAV Architecture, PCB Design, Computer Vision, Python, C
- Tools 📌 Altium Designer, EasyEDA, SolidWorks, Tinkercad, OptiSystem, Comsol
- Certifications 📌 Altium Education PCB Design
- MOOCs 📌 Microwave Engineering (Labcast), Quantum Computing (TU Delft edX)

Leadership & Interests

- Event Role  **PR & Event Representative** - Eventique, RRU
- Interests  Philosophy, Art History, Abstract Sketching