

Vishal Singh

✉ vishalsinghb26@gmail.com ☎ 7014226689 in Vishal Singh 🌐 Vishallls

Education

Jaypee Institute of Information Technology

Electronics and Communication Engineering

Oct 2022 – May 2026

CGPA: 6.8/10

- Gate Qualified in third year: Gate Score- 350

Projects

Pronunciation Assistant (Python, OpenCV, Tkinter, Docker)

[Pronunciation-Assistant](#)

- Developed a Python-based GUI leveraging NLP to detect and correct pronunciation errors, achieving a **50% improvement** in user accuracy and feedback quality.
- Integrated advanced AI models including **Wav2Vec2.0** for speech recognition, **YOLOv5** for real-time object detection, and grammar correction using **LanguageTool**.
- Enhanced user interactivity through multilingual translation and text-to-speech feedback, improving engagement and learning outcomes.

Soldier Health Monitoring and Position Tracking System (IoT, ESP32, AWS IoT Core)

[SoldierHealthTracking](#)

- Built an IoT-based real-time health and location monitoring system with 85% GPS accuracy using LM35 and NEO-6M modules.
- Configured data transmission via Blynk Cloud, and explored integration with **AWS IoT Core** for real-time scalability.
- Reduced data latency to under 3 seconds over a 50-meter range with wireless communication using ESP32.

Work Experience

NHPC Ltd. – IT & Communication Department Intern, Corporate Office

May 2025 – July 2025

- Assisted the Networking Cell in maintaining and troubleshooting enterprise network infrastructure, including switches, routers, and structured cabling.
- Gained hands-on experience with LAN/WAN technologies, IP addressing, network security, and Cisco-based management tools.
- Contributed to documentation and auditing of IT assets, network diagrams, and compliance reports within the department.

Freelance Product & DevOps Associate – EdTech Startup (Remote)

Jan 2025 – Apr 2025

- Collaborated with a small team to evaluate and enhance the startup's UI/UX through feedback from 15+ potential users.
- Assisted the cloud infrastructure and DevOps team, gaining exposure to **AWS services** and CI/CD workflows.
- Contributed to discussions on product scalability, cloud resource optimization, and deployment strategies.

Technologies

Cloud Platforms: AWS (EC2, S3, IAM, Lambda, EBS, VPC, Subnetting), Azure (Basics)

DevOps Tools: Docker, Linux, SSH Scripting, Git/GitHub, CI/CD (Basics)

Networking: LAN/WAN, IP Addressing, Routing, Switching

Languages: Python, C, C++, SQL

Frontend: HTML, CSS, JavaScript, Bootstrap, JQuery

Productivity Tools: Excel, PowerPoint, Canva, Adobe Premier Pro

Soft Skills: Problem Solving, Communication, Team Management, Strategic Planning

Certifications

Microsoft Azure Fundamentals [\[Certificate Link\]](#)

CDAC Cloud Bootcamp [\[Certificate Link\]](#)