# Rishik Reddy Cheruku

6300436107 crishikreddy@gmail.com Github LinkedIN

## **OBJECTIVE**

Motivated and detail-oriented Computer Science graduate with a solid academic background and practical experience in software development, networks, and system integration. Eager to contribute to innovative projects, apply adaptable technical skills across domains, and grow within a collaborative, forward-thinking organization.

**EDUCATION** 

**Bachelor of Technology** 

SY<sub>.</sub> .

Computer Science and Engineering

Amrita School of Engineering, Coimbatore, Tamil Nadu, India

CGPA: 8.31

**Intermediate Education** 

Resonance, Hyderabad, Telangana, India

CGPA: 9.66

Secondary Education

Narayana High School, Tirupati, Andhra Pradesh, India

CGPA: 9.61

## **PROJECTS**

## Fog Computing-Based Air Quality Monitoring System

Nov 2024 - Apr 2025

Sep 2022 - Jun 2026

Aug 2020 - July 2022

July 2019 - June 2020

Fog Computing | Arduino | Raspberry Pi | LoRa | AWS (EC2, IoT, Database) | React | Node.js

- Implemented fog computing architecture to enable local data processing on Raspberry Pi edge devices, enhancing speed and reducing cloud dependency in real-time air quality monitoring.
- Established a LoRa-based communication network for long-range, energy-efficient data transmission between distributed monitoring nodes and edge devices.
- Integrated with AWS services (EC2, IoT Core, Cloud Database) to support scalable storage, cloud synchronization, and secure device management.
- Developed a dynamic React + Node.js dashboard for real-time air quality visualization, alerts, and long-term analytics through interactive graphs.

## AgroESP – Smart Polyhouse Solar Drying System (with Sony Japan via SSUP) Flutter (Dart) | REST APIs | Cyber-Physical Systems | Sony Spresense

Dec 2024 - Jun 2025

• Contributed as part of the mobile development team to AgroESP, a smart agriculture project under the

- Sony Semiconductor Solutions University Partnership (SSUP) at Amrita Vishwa Vidyapeetham.

   Built a cross-platform Flutter application to interface with Sony Spresense-powered edge devices, enabling
- farmers to monitor solar dryer conditions in real time.

   Supported integration of REST APIs for sensor data visualization, remote actuator control, and feedback from multicore edge learning models.
- Delivered a usable, responsive, and field-tested app designed for deployment across polyhouse farms and small-scale enterprises.

## Safe Guard – Emergency Alert Application

Feb 2025 - Jun 2025

Flutter (Dart) | GPS | SMS | Android

- Developed and deployed a real-time emergency alert app, Safe Guard, featuring GPS-based live location sharing, auto-dialling emergency contacts, and offline SMS fallback for critical scenarios.
- Integrated third-party APIs for enhanced location and messaging functionality, ensuring communication even without internet access.
- Designed with accessible UI principles large tap targets, clear fonts and followed emergency UX patterns for minimal-latency response under stress.
- Tested on real Android devices, achieving high reliability, performance, and responsiveness in live conditions.

## AREAS OF INTEREST

- Computer Networks
- Internet of Things
- Full Stack Development

### **SKILLS**

## **Programming Languages**

• Python, Flutter(Dart), C, C++, MERN Stack, HTML, JavaScript, Java

#### Certifications

- Supervised Learning, Advanced Learning Algorithms Deeplearning.AI
- Complete Python Bootcamp Udemy