# **SAURABH KUMAR**

Software Developer | Btech at IIT Hyderabad | Ex-SDE intern at Mercedes Benz R&D

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## **WORK EXPERIENCE**

#### Mercedes Benz R&D India

Software Development Intern

Jan 2024 - Jul 2024

- Designed and deployed a centralized Apache Flink platform, reducing resource costs by 30% and streamlining data processing for 10+ teams.
- Developed a full-stack web application using Vue.js and Spring Boot, reducing resource provisioning time from **3 days** to **minutes**.
- Automated CI/CD pipelines with Azure DevOps, achieving 95% deployment success rate and cutting release time by 50%.
- Orchestrated the deployment of containerized applications on Azure AKS, enhancing system scalability to handle **2x traffic** during peak loads.
- Integrated PostgreSQL and Cosmos DB, improving query response times by **40**%, and ensured seamless data access for **100+ users**.
- Automated infrastructure provisioning with Terraform, reducing manual setup time by 70% and ensuring consistent deployments.

#### **EDUCATION**

## **Indian Institute Technology Hyderabad**

B.Tech (Chemical Engineering) - 8.56

Oct 2021 - May 2025

#### **SKILLS**

- Programming Languages: C, C++, SQL, Java.
- Web Development: HTML, CSS, Vue.Js, Spring Boot, REST Web Services
- Specialized Skills: Azure, Terraform, CI/CD, Git, Understanding of Microservices, Docker/Kubernetes
- Computer Science Coursework: Data Structures & Algorithms, OOPs, OS, DBMS, Computer Networking
- Soft Skills: Collaboration, Problem-Solving, Communication, Critical Thinking, Time Management, Attention to Detail, Teamwork.

## **PROJECT**

## JWT Authentication | Spring Boot, MySQL 🔀

2024

- Implemented User registration, login, role-based authorization
- JWT-based authentication with refresh token support
- Secure RESTful APIs using Spring Security

#### Video Streaming Platform [7]

2024

 Designed a scalable video streaming platform using React (frontend), Spring Boot (backend), and MySQL, reducing video load times by 50% and improving user engagement by 25%..

## File Compressor | Python, Huffman Coding [2]

2022 - 2023

 Developed a Python-based Huffman Coding application, effectively compressing and decompressing text files to optimize storage space.

## Spell-Checker I C++, Red-Black Tree [7]

2022 - 2023

• The "Spell Checker" is an C++ program application that uses a Red-Black Tree data structure to efficiently check the correctness of words and provide suggestions for misspelled words.

#### **AWARDS AND ACHIEVEMENTS**

- Secured Sub-1000 GEN-EWS Rank in JEE Advanced 2021
- Ranked among the top 1 percentile in JEE Main 2021
- Passed the NDA written exam for NDA-145 in 2020