Shubham Gupta

B.Tech (Honours) CS&E — Data Science | @ Portfolio

in linkedin.com/in/shubhamgupta7217 — ☐ leetcode.com/u/shubhamgupta7217 — ☐ github.com/shubhamgupta7217

Summary — B.Tech (Honours) CS&E graduate skilled in Java, Python, and SQL, with hands-on experience in DSA and machine learning. Eager to build robust & scalable web apps, data pipelines, and ML-powered solutions that drive real impact.

Education

Bachelor of Technology(With Honours)

Computer Science and Engineering(Data Science), PSIT Kanpur

Senior Secondary

Mahatma Hansraj Modern School

8.5 CGPA

2025

91.4%

2021

Experience

Cognizant Technology Solutions

May 2025 - Sept 2025

Programmer Analyst Trainee (Internship)

- Completed 600+ hours of structured training in Java, SQL, DSA, and Agile, simulating real-world engineering tasks.
- Led and worked in cross-functional Agile teams across sprints, focusing on feature testing, debugging, and integration.
- Automated regression test workflows in simulated Agile sprints using Java and SQL, reducing manual effort in practice projects and strengthening QA skills.
- Designed and automated 25+ test cases, increasing test coverage by 20% and enhancing test reliability.

Projects (7)

Black Friday Sales Analysis — Data Analysis & Visualization |

July 2025

- Performed EDA on 800000 retail transactions, uncovering 3 major purchasing patterns across demographics and product categories, enabling data-driven retail insights.
- Applied data cleaning, preprocessing, and feature engineering, reducing missing value impact by 15% and improving data reliability.
- Conducted **statistical analysis** using Python (Pandas, NumPy, Seaborn), identifying **5+ key drivers** of sales behavior.

Driver Drowsiness Detection Using YOLO — Machine Learning & Computer Vision |

May 2025

- Led a 4-member team to build a computer vision based drowsiness detection system addressing real-time safety
- Implemented YOLO-based face and eye detection with PyTorch and OpenCV for accurate real-time monitoring.
- Addressed a critical real-world challenge by contributing to a system designed to reduce road accidents caused by driver fatigue (WHO: 20% of crashes).
- Conducted testing under varied lighting and angles, achieving 87% accuracy and reducing false positives by 15%.

Dijkstra's Algorithm Visualizer — Algorithms & Data Interpretation |

Mar 2024

- Built a UI tool to simulate Dijkstra Algorithm, enabling interactive visualization, deeper understanding and **debugging** of graph algorithms.
- Optimized the algorithm using priority queue with time complexity O(V+E) and space complexity O(V)
- Optimized graph representation using adjacency lists, improving performance by 20% compared to naive matrix-based approaches.

Technical Skills </>

Programming Languages & Algorithms: Java, Python, SQL, JavaScript, C++, Data Structures, Algorithms Courseworks: Object Oriented Programming, DBMS, OS, CN, System Design, SDLC, SOLID, Design Patterns

DS & Machine Learning: Pandas, NumPy, scikit-learn, Matplotlib, Seaborn, EDA, Mathematics

Web Development: React.js, Node.js, Express.js, HTML, CSS, REST APIs

Databases & Tools: MySQL, MongoDB, Git, GitHub, Postman, Excel, Prompt Engineering, Agile Methodologies, Jira

Achievements

Coding Competitions: Secured Global Rank 2107 in TCS CodeVita 2024; showcasing applied problem-solving abilities at scale. Algorithmic Programming: Solved 1500+ DSA problems across platforms; LeetCode Global Rank under 12000.

GATE Qualification: Qualified GATE 2024 & 2025 with AIR 915; demonstrating strong conceptual skills.

Academic Excellence: Graduated with B.Tech(with Honours) in CSE (Data Science) – 8.5 CGPA; showcasing my consistency.

Certifications

