

Ankit Kumar

Software Developer

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EDUCATION

MS in Computer Science (GPA : 3.89), *George Mason University* [🌐](#) Aug 2023 – May 2025 | Fairfax, US
- **Relevant coursework:** Theory/Application of Data Mining (CS 584), Machine Learning (CS 688), Software Design and Architecture (CS 621)

BS in Computer Science (GPA: 3.63), *Visvesvaraya Technological University* Aug 2016 – Jul 2020 | Mandya, India
- **Relevant coursework:** Artificial Intelligence, Software Engineering, DBMS, Operating Systems, C Programming

SKILLS

Languages & Frameworks

Python, Angular Ionic, Node.js, React.js, Mongo DB

Libraries

NumPy, Pandas, Scikit, Seaborn, Keras, Chart.js, Material UI

Tools and Technologies

OpenCV, VS Code, GIT, Jira, MongoDB, Jupyter Notebook, Agile, Scrum

Soft Skills

Proven problem-solver, Highly effective team player, Disciplined, Attention to Detail

PROFESSIONAL EXPERIENCE

Packaged Application Development Analyst, *Accenture Pvt. Ltd.* [🌐](#) Feb 2021 – Jul 2023 | Bangalore, India
- Pioneered solutions for the "Value Insights Platform," orchestrating a robust full-stack architecture using MEAN stack that achieved an impressive 30% performance boost of the application, showcasing proficiency in both frontend and backend development.
- Engineered sophisticated, cross-platform interfaces for challenges related to user engagement, implemented advanced analytics tools such as Chart.js for in-depth user behavior analysis, and devised targeted UI/UX enhancements, resulting in a notable 20% reduction in bounce rates and a substantial boost in overall user engagement, for mobile and web platform.
- Implemented intricate data visualization solutions with Chart.js, elevating data accuracy by 35% and reducing processing time by 20%, demonstrating expertise in full-stack data handling and presentation.
- Proved myself as a problem-solver, and a high-performing team, ensuring near-zero errors in deliverables and maintaining a remarkable accuracy rate, underscoring commitment to excellence in full-stack project leadership.
- Leveraged a comprehensive full-stack toolkit, including MERN and MEAN stacks, to seamlessly integrate backend and frontend components, employing advanced algorithms and data mining for optimal system performance.
- Mentored new team members, providing comprehensive guidance on project intricacies and facilitating a smooth onboarding process.

PROJECTS

Recommender System Movie Ratings, *Data Mining Coursework Project* Sep 2023 – Nov 2023
- Showcased expertise in data analysis and applied advanced collaborative and content-based filtering techniques to develop a highly effective Recommender System.
- Implemented hybrid approaches, integrating diverse data sources including movie genres, directors, and actors to enhance the precision of user-movie rating predictions.
- Leveraged strong analytical skills to optimize the model using techniques like weighted hybrid models, regularization, handling cold start problems, and achieving outstanding performance in predicting user-movie ratings, with a focus on improving the Root Mean Squared Error (RMSE) metric.

Accident Detection Using Image Processing, *Undergrad final year project* Dec 2018 – Mar 2019
- Orchestrated the development of an innovative accident detection system employing real-time surveillance cameras, significantly reducing emergency response times.
- Implemented a cutting-edge Convolutional Neural Network (RetinaNet with Resnet50 backbone) and meticulously curated a specialized dataset for precise vehicle detection, ensuring superior model accuracy.
- Engineered a bespoke algorithm employing a combination of Optical Flow and Object Tracking techniques to discern accidents by intricately tracking each vehicle's velocity vector, elevating the system's proficiency in recognizing critical events.
- Innovated a swift notification mechanism, instantly alerting nearby rescue teams upon detecting accidents, streamlining and expediting emergency response procedures.
- Showcased expertise in algorithmic design and meticulous implementation, exemplifying a hands-on approach in addressing complex challenges and delivering impactful real-world solutions.

CERTIFICATES

- Full stack web development using MERN stack [🌐](#) - Mobile Application Development (Android) [🌐](#)