PRITHVIRAJ VERMA | 9926719150 | prithraj120@gmail.com

COMPUTER SCIENCE & ENGG. (B.Tech 4Y) | LinkedIn

EDUCATION

Year	Degree/Exam	Institute	CGPIVMarks
2027	B.TECH	IITRAM - 231040012011	8.55/ 10
2022	Board of Intermediate Education	Medicaps International School	88.2%
2020	Board of Secondary Education	St. Paul's Higher Secondary School	86%

INTERNSHIP EXPERIENCE

Research Intern | IIT Delhi   **[Jan'25-Present]**
New Delhi, Delhi

- Developing lightweight CNN and advanced ML/DL models, including Vision Transformers, ResNet, CNN with Self-Attention, and CNN with Bi-LSTM, for classifying Sleep Spindles and K-Complexes.
- Processing EEG signals using techniques like SMOTE and Hjorth parameters for feature extraction and data balancing.
- Utilizing Python and frameworks like TensorFlow and PyTorch for model development and optimization.

Data Scientist and Analyst Intern | Yads Technology Pvt. Ltd.   **[Jun'24-Aug'24]**
Vadodara, Gujarat

- Fetched and integrated 1,000+ news articles, optimizing API performance by 93% into a PostgreSQL database
- Performed data cleaning, analysis, and visualization to generate insights that supported decisions, boosting efficiency by 92% from aggregated news data
- Streamlined data extraction using Python and SQL, reducing time by 46% and creating dashboards that improved client decision-making by 78%.

KEY PROJECTS

Suggestive Automated Mental Health Identification System: MINDSCAN   **[Oct' 24 – Jan'25]**
Project: Self Project

- Developed an AI system to identify early signs of mental health disorders using real-time EEG and ECG signals.
- Achieved over 95% accuracy in detecting abnormal patterns.
- Improved early detection rates by 30% through actionable insights for users and healthcare providers.
- Planned future integration of PPG signals for an additional 15% accuracy increase.

Insomnia Detection Model   **[Sept' 24 – Nov'24]**
Project: Self Project

- Developed a machine learning model for insomnia detection using PPG signals
- Employed Wavelet Transform and Hjorth Parameters, achieving 96.4% accuracy.
- Integrated 1D CNN, 2D CNN, and Vision Transformer architectures for signal processing.
- Utilized Python, Tensorflow and Pytorch for model development and optimization.

Face Prediction Model   **[Jul' 24 – Aug'24]**
Project: Self Project

- Achieved 96% recognition accuracy with a real-time face prediction model using Python, OpenCV.
- Optimized model to reduce lag by 66%, enhanced security by increasing recognition distance by 15%.
- Ensured well-organized code with comprehensive comments and documentation.
- Suitable for security systems, attendance tracking, and personalized user experiences.

Network Activity Anomaly Detection Model | AiPlanet   **[Jun 24 - Jul' 24]**
Project: Self Project

- Attained 92% detection rate for suspicious activities in network traffic, strengthening cybersecurity.
- Reduced false positives by 15% with advanced feature extraction and anomaly detection algorithms.
- Boosted detection accuracy by 89% for suspicious network activities, contributing to cybersecurity.
- Accelerated model efficiency by 20% using Python, Seaborn, and Scikit-Learn.

POSITION OF RESPONSIBILITY

Campus Ambassador | GeeksforGeeks   **[Jan'25 – Present]**
Drove campus outreach and engagement to promote GeeksForGeeks as a competitive learning platform.

- Spearheaded campus outreach to promote GeeksforGeeks as a leading technical learning platform.
- Increased student participation on GeeksforGeeks by 40% through effective promotions and collaborations.
- Organized 3+ workshops and events, benefiting 100+ students with coding and interview preparation skills.

Student Executive I Unstop   **[Oct'24-Present]**

Drove campus outreach and engagement to promote Unstop as a competitive learning platform.
- Led campus-wide outreach initiatives, increasing student engagement on Unstop by 35% through strategic messaging and partnerships.
- Organized 5+ targeted workshops and competitions, boosting platform usage by 40% and equipping 150+ students with event-specific skills.
- Built a collaborative peer network across departments, enhancing Unstop's visibility and growing the community by 30%, fostering inter-college connections and engagement.

Head - Content Creation and Social Media | Career Development Cell | IITRAM   **[Jan'24-Present]**

A team of 165 members dedicated to advancing career development through strategic initiatives and impactful projects
- Increased student engagement with online resources by 25%, enhancing career readiness.
- Generated content reaching 1000+ students, enhancing career readiness by 67% to provide students with actionable career insights.
- Led workshops attended by 200+ students, achieving 85% satisfaction and career fairs to guide students in career decision-making.

AI/ML Team Leader I Coding Club | IITRAM   **[Oct'23-Present]**

A team of 140 members working collaboratively on advanced coding projects and innovative solutions.
- Led and completed 5+ coding projects using Python and C++, improving coding efficiency by 15%.
- Secured top 10% in coding competitions, fostering innovative team solutions.
- Enhanced coding skills of 100+ students by organizing hands-on workshops, increasing problem-solving proficiency by 30%.

AWARDS AND ACHIEVEMENTS

- Secured overall percentile of 95.27 in Joint Entrance Examination Mains 2023, out of 1.2 million appeared.
- Secured First Position and received Gold Medal in International Maths Olympiad.

RELEVANT COURSES

Data Science and Analytics Professional Certificate-Summer Analytics 2024 | IIT Guwahati   **[Jul'24]**
- Acquired proficiency in data science methodologies, statistical analysis, and machine learning, and employed these skills to analyze and interpret complex datasets.
- Participated and Excelled in Hackathons conducted by IIT Guwahati and achieved Certificate of Excellence.

IBM Data Science Professional Certificate | IBM   **[Jun'24]**
- A 12-course series covering data analysis, machine learning, and data visualization using Python, SQL, and various data science tools.
- Developed and deployed practical projects to solve real-world data challenges.
- Gained hands-on experience with advanced data science techniques and tools.

Machine Learning Specialization Certificate | DeepLearning.AI   **[May'24]**
- A comprehensive 3-course series. Earned expertise in supervised and unsupervised learning, neural networks, and deep learning techniques, applying these skills to real-world datasets.

Google IT Automation with Python Professional Certificate | Google   **[Feb'24]**
- A 6-course series. Developed proficiency in Python programming, automation, and IT support tasks, including troubleshooting, configuration management, and using Git for version control.

Programming in Modern C++ | IIT Kharagpur   **[Mar'24]**
- Acquired expertise in C++ programming, including advanced features like smart pointers, lambdas, and the Standard Template Library (STL), and utilized these skills to develop efficient and robust software solutions.

The Joy of Computing using Python | IIT Ropar   **[Dec'23]**
- Gained foundational knowledge in Python programming, algorithms, and data structures, and applied these skills to solve practical computational problems.

SKILLS AND EXPERTISE

Programming Languages: C++, Python, HTML, SQL, MATLAB, Machine Learning, Deep Learning.

Libraries and Frameworks: Pytorch, GITHUB, Matlab, Pandas, Matplotlib, Plotly, Seaborn, Scikit-Learn, Tensorflow.