# SAURABH BHAUSAHEB ZINJAD

### **EDUCATION**

### Arizona State University, Tempe, USA

August 2023 - May 2025

Masters of Science in Computer Science (GPA: 4/4)

Relevant Courses: Social Media Mining, Knowledge Representation and Reasoning Algorithms, Statistical Machine Learning

Pune Institute of Computer Technology (PICT), Savitribai Phule Pune University, India July 2015 - June 2019 Bachelor of Engineering (GPA: 8.53/10)

Relevant Courses: DSA, OOP, OS, System Programming, Computer Networks, Information Theory, Artificial Intelligence, Machine learning, Digital Video and Image Processing

## TECHNICAL SKILLS

Programming Languages: Python, JavaScript, C#, C++, SQL, R, Java, Shell Scripting

Data Science: Databricks, PySpark, TensorFlow, PyTorch, MXNet, OpenCV, Scikit Learn, Pandas, Matplotlib, Keras

Cloud and DevOps: Azure, AWS, Docker, Kubernetes, MLFlow, Jupyter Notebook, Git

Full-Stack Tech: Angular, React, .Net Core, NodeJs, Django, Flask, FastAPI, MongoDB, SQL Server, MySQL, Postman

Certifications: Deep Learning Specialization, MLOps for AI Engineers and Data Scientists, Microsoft Azure Fundar

#### WORK EXPERIENCE

# Tiger Analytics

Bangalore, India

Senior Machine Learning Engineer

June 2022 - July 2023

- · Developed Interactive Dashboards, Constraint-based ML Models, Web App, Data & CI/CD pipelines, and Comprehensive Documentation for MSP Value Optimization in Petcare sector with a team of 8 analysts.
- · Created the MLCORE product (end-to-end MLOps platform) by implementing research ideas, prototyping, backend API Implementation, and integrating it with numerous cloud services, attracting four significant clients.

### Winjit Technologies

Pune, India

Software Engineer

January 2020 - June 2022

- · Engineered RESTful APIs Architecture and Distributed services; Designed low-latency responsive UI/UX application features with high-quality web architecture; Managed and optimized large-scale Databases.
- · Initiated and Designed a standardized solution for dynamic forms generation, with customizable CSS capabilities feature, reducing development time by 8x; Led and collaborated with a cross-functional team of 12 members.

# **Automation Teknix**

Pune, India

Deep Learning Engineer

September 2019 - January 2020

- · Devised a Lightweight Object Recognition Engine with low computational cost by leveraging an SSD algorithm with MobilenetV2 architecture, decreasing survey error by 22%.
- · Conducted research, prototyped neural network flow, conceptualized POC, training, and monitoring of models resulting in a 7% increase in accuracy and 2x reduced inference time.

# **PROJECTS**

### Search Engine for All file types - Sunhack Hackathon - Meta & Amazon Sponsored

3 Nov 2023 - 5 Nov 2023

- · Converted and stored every file type data as vector embeddings, ensuring low-latency search capabilities.
- · Utilized Machine Learning techniques such as BERT, OCR, ResNet50, and Image Captioning to parse Image features.
- · Contributed to Elasticsearch implementation for blazing-fast search responses, with millisecond response times.
- · Led Python FAST API and angular development, providing efficient data access and retrieval.

# Prompt Engineering Hackathon for Humanities

13 Oct 2023 - 15 Oct 2023

- · Led Soul LLM Brews to 1st runner-up position in the "Prompt Engineering Hackathon for Humanities."
- · Demonstrated a creative mindset in problem-solving, going beyond technical constraints.
- · Crafted an AI persona, LLM Brews, to explore LLM's capabilities and create innovative collaborations between humans and machines.
- · Spearheaded the exploration of AI storytelling tools, including ChatGPT, Bing Chat, Google Bard, Jasper.ai, Writesonic, etc.
- · Conducted whiteboard sessions to brainstorm and strategize the use of LLM for extended storytelling.
- · Developed Pro Tips for Prompting, optimizing LLM parameters for creativity, and experimenting with different ChatBots for diverse responses.
- · Addressed limitations in narrative flow, simplicity, emotional depth, and hallucinations through innovative approaches.

- · Collaborated with a team of AI personas, including an insightful Critic and a keen Book Reader, to enhance focused and productive discussions.
- · Explored GenAI models, such as Runway, Midjourney, and DALL-E Open Ai, to add nuanced emotions and depth to the narrative.
- · Presented ideas and work in a humorous manner, creating a compelling story for the protagonist character, Gunther, using AI.
- · Successfully identified and addressed challenges in LLM's storytelling capabilities.
- · Demonstrated the ability to navigate complex tasks and adapt to evolving requirements during the 17-hour hackathon.

## Forest Fire Detection using IoT Sensor Data

September 2021 - January 2022

- · Devised a TabNet Classifier Model having 98.7% accuracy in detecting forest fire through IoT sensor data, deployed on AWS and edge devices 'Silvanet Wildfire Sensors' using technologies TinyML, Docker, Redis, and celery.
- · Examined and utilized performance metrics (Recall, F2 score, sensitivity, specificity, etc.) to reduce high type II error.
- · Performed Model Exploration, Analysis, and Optimization.

### **ACHIEVEMENTS**

1st runner-up in "Prompt Engineering Hackathon 2023 for Humanities"

- · Received the 'Extra Miller 2021' award at Winjit Technologies for outstanding performance.
- · President of Machine Learning Club: Led a team of 20 people in a project and was awarded "Best Project of the Year."
- · Finalist in E-yantra Robotics Competition 2018 IITB.
- · Dance Section's Head of PICT Art Circle: Best dance choreography for Winning "Firodiya theater competition 2019."
- · Performed in multiple award-winning state-level drama competitions and received the best-organized team prize thrice.
- · An active member of the NSS (National Community Service Group in PICT) in 2016.