Harshitha Bommakanti

bommakantiharshitha@gmail.com Mobile: +91 8688261027 LinkedIn Github

Academic Qualifications

Vidya Jyothi Institute of Technology, Hyderabad May 2019 | CGPA-8.85/10, India
Bachelor of Technology- Electrical and Electronics
- Standardized Test Score: GRE – Verbal: 154/170, Quantitative: 165/170, AWA - 3.5, IELTS – 7.0

Technical Skills

- **Programming Languages**: Python, Basic Java, C.
- **Libraries:** Pandas, Scikitlearn, Matplotlib, PyTorch.
- **Miscellaneous:** Machine Learning, Deep Learning.

Work Experience

Product Development Intern, Turnkey Learning, India May 2021 – Jun 2021
- Advanced my knowledge about deep neural networks with cutting-edge content offered in association with Carnegie Mellon University by professor Bhiksha Raj.
- Experience working with modern Deep Learning software architecture and frameworks including PyTorch.
- Developed and tuned deep learning framework/application independently, analyzing workload behaviors on CPU/GPU and others.
- Developed models for Face Recognition, Classification using CNN, and Phoneme Recognition using MLP.

National Small Industries Corporation Intern, India Jun 2018 – Jul 2018
- Implemented a Smart Traffic System, which uses weight and density sensors to provide real-time information.
- Composed a fine document on difficulties of PLCs, signal processing, data conversion, and various communication protocols on the development of ladder logic to control the traffic system.
- Experienced using Allen Bradley PLC software.

Projects

Frame Level Classification of Speech, Deep Learning Jun 2021
- The goal is to identify the phoneme state label for each frame in the test dataset.
- The provided dataset consists of audio recordings (utterances) and their phoneme state (subphoneme) labels from articles published in the Wall Street Journal (WSJ).
- Built a high proficiency model that identifies the phoneme state label for each frame in the test dataset through feedforward neural networks.

Face Recognition and Verification, Deep Learning May 2021
- Given an image of a person's face, the task is to build a model that classifies the ID of the face & predicts the cosine similarity between two images.
- Built an optimized model using Convolutional Neural Networks and designed an end-to-end system for face recognition and verification.
- Identified the similarity between two faces using Cosine Similarity by extracting embeddings using Transfer Learning.

Finding Donors for Charity, Machine Learning Feb 2021
- Designed a supervised algorithm model that accurately identifies people most likely to donate to their cause using data collected from the 1994 U.S. Census.
- Created charts in Jupiter Notebook to perform preliminary analysis and visualize data using Matplotlib.
- Technologies Used - Python, Numpy, Pandas, Scikit-Learn, Matplotlib.

Automated Breast Cancer Detection, Data Science Jan 2021
- Developed a model that predicts early breast cancer detection by candidate region of interest (ROI) from an X-ray image, whether the region corresponds to a malignant tumor or is normal.
- Optimized the designed network to increase accuracy to a greater extent.
- Technologies Used - Python3, Numpy, Pandas, Matplotlib.

Achievements & Co-Curricular Activities

- Attended a workshop on Data Science and Machine Learning, Artificial Intelligence and Data Mining conducted by IIT Madras, Shaastra 2021,
- IBM Certification on Python for Data Science, AI & Development on June 9, 2021.
- Microsoft AI classroom series Assessment on 21-12-2020.
- National conference paper on "Arduino Based Autonomous Fire Fighting Robot" in a two-day national conference on evolutionary computing applications to Electrical Engineering (NCECA), organized on 2nd & 3rd May 2019, VJIT.
- Certified as a lean technocrat, a campus to Industry program held at VJIT, Hyderabad 2019.