# **DEVI SANDEEP ENDLURI**

College Station, Texas | (979) 739-3429 | https://github.com/dsandeep0138 dsandeep97@tamu.edu | https://www.linkedin.com/in/dsandeep97

**EDUCATION** 

Texas A&M University, College Station, Texas

Aug 2019 – (exp.) May 2021

Master of Science in Computer Science

GPA: 3.8 / 4.0

Coursework: Deep Learning, Natural Language Processing, Analysis of Algorithms, Info Storage and Retrieval

Indian Institute of Technology Kharagpur, Kharagpur, West Bengal, India

Aug 2010 – May 2014 GPA: 8.27 / 10

Bachelor of Technology in Computer Science and Engineering

#### **EXPERIENCE**

#### Pennsylvania State University, State College, Pennsylvania

Data Science Research Intern

May 2020 - Present

- Developed a fully automated end-to-end framework (ChartReader) to extract data from bar-plots in scientific research papers using OpenCV, Tesseract
- Applied Machine Learning techniques to separate bar plots from rest of the images. Further applied Computer vision techniques to detect axes with an accuracy over 90%, plot labels and legends and to finally extract data from the plots.

# Data Analytics at Texas A&M (DATA) Lab, Texas A&M University, College Station, Texas

Graduate Student Researcher (under Prof. Xia Ben Hu)

Jan 2020 - Present

- Working on a pipeline utilizing AutoML to automatically search for a best neural model for Natural Language Processing tasks such as Named Entity Recognition
- Constructed Knowledge graphs based on relations extracted from COVID-19 Open Research Dataset (CORD-19)

#### Qualcomm India Private Limited, Hyderabad, India

Senior Software Engineer

July 2014 – July 2019

- Facilitated design, development of innovative algorithms and maintenance of proprietary software CnE (Connectivity Engine) for intelligent switchover between 3G/4G and Wi-Fi without any user intervention
- Spearheaded various IMS critical value-add features (G2L Tuneaway, Dual VoLTE) for Qualcomm chipsets
- Interacted with 10+ internal and external teams to develop features end-to-end. Experience with partnership and collaboration with customers, ecosystem providers and support, during all stages of software product life cycle
- Awarded 5+ Qualstars, Orion Insta award in appreciation of outstanding contributions to Android Connectivity domain

# **PROJECTS & COMPETITIONS**

Open Source Contributions: scrapy (#4634), tensorflow (#40610), scipy (#20), scikit-image (#4798, #4803), genism (#2869)

#### Real-time Twitter Data Analysis using Spark

April 2020

 Performed Real-time data analytics on COVID-19 over a Twitter Stream using Big Data Technologies of Hadoop Ecosystem such as Flume, Kafka and Spark Streaming. Built a Flask Web Application to display results and dashboards

### Regression models to predict flight delays | TAMIDS 2020 Data Science Competition

April 2020

• Built Linear, Lasso, Ridge and Bagged Linear regression models to predict flight delays for 3<sup>rd</sup> and 4<sup>th</sup> Quarters of 2019. Presented 2018 flight delay data visually through dashboards using leaflet in R. Achieved test RMSE of 9.952

# Deep Learning based Image Colorization with U-Net

Oct – Dec 2019

• Developed neural network regression and classification approaches to convert grayscale images to colorized RGB images with architecture inspired by U-Net, a convolutional method for image segmentation. Achieved accuracy of 70

#### Abstractive Text Summarization using pre-trained encoders (NLP project)

Oct – Dec 2019

 Modified existing text summarization model with pre-trained BERTSUM encoder model and decoder architecture by introducing recurrence in model to improve better copying of source text, achieved a ROGUE score of 19.03

# Data Visualization model to analyze Tacos and Burritos data | Goldman Sachs Challenge, TAMU Datathon

2019

• Derived insights from a list of 19,439 restaurants and businesses with menu items containing tacos and burritos from across the US. Delivered an interactive visualization tool using Tableau detailing the data analysis performed

#### **AWARDS AND HONORS**

- Finalist in TAMIDS (Texas A&M Institute of Data Science) 2020 Data Science Competition
- 17th out of 70 teams in ConocoPhillips Kaggle challenge during TAMU Datathon, 2019
- 8th out of 1000+ participants in HackerEarth Machine Learning Challenge Predict the DEFCON level

#### **TECHNICAL SKILLS**

Languages: (proficient) Python, R, C, C++; (familiar) SQL, Java, Perl, Ajax, PHP, JavaScript

**Frameworks/Platforms**: Python (NumPy, Pandas, Scikit-learn, TensorFlow, Keras), MATLAB, R (ggplot2), OpenCV, Latex **Certifications**: Machine Learning, Deep Learning (Stanford University); R programming (Johns Hopkins University)