Jay Yanamandala
(408) 460-5079, San Jose, CA
jyanamandala@gmail.com

Deep Learning, ML Engineer
Kaggle LinkedIn GitHub
Shiny Apps RPubs
Portfolio: https://jayc279.github.io

Innovative and strong analytical modeling programming skills with a team-oriented attitude, driven to bring high quality business solutions towards higher accuracy and predictability. Experienced in fine tuning hyperparameters for Deep Neural Network model. Eager to contribute to AI community.

Summary

- Professional certificates in Deep Learning, Machine Learning, and Data Sciences from Deeplearning.ai, Stanford University, University of Washington, and Johns Hopkins University respectively.
- Created workflows gathering design violations and posting as tables in Dash Web UI. Worked with India team to highlight issues found in production as well as pre-release builds.
- Proficient in designing, coding, analyzing and fine-tuning hyperparameters Deep Neural Networks - Model architectures, and coded. with Keras_Tuner, Bayesian_Optimization, RandomSearch, and SciKit-Learn packages.
- Good knowledge and strong understanding of machine language algorithms, and create custom classes to improve predictions of Deep Neural Networks.
- Effective communication of complex technical concepts, to technical leads across multiple product areas and relay any findings to leadership and product teams.
- Activity in the field of AI/ML/DS motivated me to switch career paths.

Project/Work Summary

- NLP - The corpus data is provided by SwiftKey's Natural Language Processing (NLP) project. created bigrams, trigrams, and quad-grams to predict next word – Presentation, Shiny App
- Tuned and implemented Fully connected Neural Nets to Predict Cardiovascular disease risk in individuals with high obesity - based on several factors..
- Designed and implemented a 34-layer Residual Deep Neural Network similar to ResNet50 on 3D multi-resolution imaging datasets of kidneys for SenNet + HOA – Hacking the Human Vasculature in 3D to predict the effect of vasculature 'flow of blood, oxygen' in the human body through the vessel network.
- Designed a fully connected Deep Neural Network to predict whether a customer continues with their account or closes them for Binary Classification with a Bank Churn Dataset
- Implemented the dataset on various ML technologies to predict the outcomes of patients with cirrhosis for Multi-Class Prediction of Cirrhosis Outcomes
- Collaborated with Kaggle users to optimize a deep learning algorithm to improve models predictions on Deep Convolutional Neural Networks.
- Won multiple 'bronze' medals for notebooks written on hyperparameters search techniques:
    - Neural Networks Deep Learning Hyperparameters search
    - Keras-Tuner-hyperparameters-search-for-Obesiry-Risk-Prediction

Technical/Functional Skills

- Deep Learning, Predictive Modeling, Data wrangling, analysis, Machine Learning algorithms, Convolutional Neural Networks (CNN), GANs, TensorFlow, Keras, PyTorch, NLP, Transformers.
- Proficient in designing, coding, analyzing and fine-tuning hyperparameters Deep Neural Networks - Model architectures, and coded. with Keras_Tuner, Bayesian_Optimization, RandomSearch, and SciKit-Learn packages.
- Proficient in handling imperfections in data, data processing, preparation, analysis, and visualization techniques to train and test models.
- Experience with Data Visualization Tools: matplotlib, seaborn, and ggplot.
- Worked on image augmentation techniques to train GANs and on Reinforcement learning
- Good programming skills in Python, R, PhP, PERL, Tcl & Shell, Working knowledge of C++, and C

- Integrated custom statistical methods and metrics to measure the quality and diversity of the generated outputs
- Built and maintained scalable data pipelines and infrastructure to support automated model training and evaluation.
- Participated in code reviews and contribute to the development of reusable software components.
- Worked on cloud platforms: AWS, Google Cloud

Certificates Deep Learning (Deeplearnnig.ai) (2023) Machine Learning (Stanford) (2023)
Data Science (John Hopkins University) (2021) Machine Learning (UW) (2021)

Education University of Wyoming M.S. Electrical & Electronics, M.S. Finance

Summary: EDA Industry

- Responsible for software engineering, quality assurance, and production support.
- Recognized for consistent success in developing systems, plans, and procedures to improve processes, and enhance quality.
- Hiring, training and managing a team of 20+ engineers with diverse experience across geographies with focus on innovation, quality and deliverables
- Deep-dive problem solving, detailed analysis and debugging of quality of results for complete design implementation flow. High proficiency in prototyping solutions by scripting
- Coordination of various engineering r&d to provide solutions and fixes to field teams. Collaborating with architects, and engineers to ensure the QoR of release is same or better than previously released version.
- Partner with R&D for Flow and methodology development to deliver superior out of the box QoR from the tool with ease of use.
- Excellent understanding of QA processes, methodology and toolsets. Experience in defining and setting up testing methodology for integration, functional and regression testing.
- Established and managed an offshore development and testing team which provided services to multiple engineering organizations in the company.
- Designed and set up application monitoring systems to proactively alert proper staff of production problems.
- Managed a comprehensive integrated change control process to limit code changes to released versions.
- Created advanced web interface using CGI-PERL, PHP & MySQL to compare Quality of Results between various builds. Extended existing test infrastructure to be 90% automated.
- Designed and wrote test infrastructure & cgi-perl scripts for deployment at customer sites to test pre-release software.

To access EDA CV, please click on this link