Tvisha Ragendri Devavarapu

td2749@cumc.columbia.edu | https://www.linkedin.com/in/tvisha-devavarapu/

SUMMARY

Biostatistics/data science graduate student with background in market research, human biology, and scientific research. Seeking internships in healthcare data science and consultancy.

EDUCATION

Columbia University Mailman School of Public Health, New York, NY

Master of Science – Biostatistics: Public Health Data Science Track

Relevant Courses (in progress): Data Science I, Biostatistical Methods I, Probability

University of California at San Diego (UCSD), San Diego, CA

 $\textit{Bachelor of Science} - \textit{Human Biology} \mid \textit{GPA: 3.89} - \textit{Magna Cum Laude Honors}$

Relevant Courses: Bioinformatics, Introduction to Python, Principles of Data Science, Statistics, Genetics, Cell-Molecular-Cancer Biology, Molecular Basis/Human Disease

PROFESSIONAL EXPERIENCE

Onward Assist, Hyderabad, India

Product and Market Intern

May 2022 – August 2022

Anticipated: May 2024

Graduated: June 2021

- Compiled a 2 page technical review on existing AI and algorithmic methods in Head and Neck Cancer detection via digital pathology (WSI) modalities; used as support material for the machine learning team.
- Conducted extensive market research and LinkedIn outreach for identifying potential digital pathology clients for cancer detection data science firm; established 2 connections that led to further discussions.
- Discovered and initiated a new client-reaching opportunity by beginning the company's onboarding onto Science Exchange, a prominent online marketplace for R&D outsourcing.

DigiTele Networks – Greenko Group, Hyderabad, India

October 2021 – January 2022

Data Science Intern

- Introduced to deep learning and computer vision concepts and programs (Keras, PyTorch, OpenCV).
- Performed object detection/image processing/semantic segmentation using U-Net computational models.

O'Donoghue Lab – UCSD Skaggs School of Pharmacy, San Diego, CA

November 2018 – January 2021

Research Assistant

- Generated a biochemical profile of the fungal proteases that cause the disease Coccidioidomycosis.
- Accurately performed precise experimental procedures following correct protocols, including fluorescent kinetic assays, and proteomic procedures involving mass spectrometry to determine enzyme activity, substrate specificity, and inhibition scopes regarding the proteases.

PROJECTS

Regression-based Heart Disease Prediction Model (with Python)September 2021 – October 2021

• Created a supervised machine learning model with a mean absolute error of 0.2.

• Designed the predictions to be made using heart rate, blood sugar, and cholesterol levels as features.

Protein Sequence Analysis: Hereditary Hemochromatosis (with R)

February 2021 – March 2021

- Conducted comparative sequence analysis to determine similarities in the disease-inducing proteins.
- Employed Bioconductor and biostring packages for analysis, and LaTeX presentation for visualization.

VOLUNTEER LEADERSHIP

Biological Sciences Student Association – UCSD, San Diego, CA

November 2018 – June 2020

- Led the team as Co-Chair of the Mentorship Committee (September 2019 June 2020).
- Conceptualized and conducted 3 successful events for freshmen transition into the biology department.
- Established network of professors, graduate students, and post-docs for hosting professional events.

Saltman Quarterly: Under the Scope Review - UCSD, San Diego, CA

September 2018 – June 2019

• Published a <u>feature</u> on ongoing advancements in neurodegenerative research at UCSD after interacting with researchers working on ALS, MS, and Huntington's disease.

SKILLS

Technical: MS Word, Excel, and PowerPoint, R, Basic SQL, Python, Pandas, and NumPy.

Language: Trilingual - English, Telugu, and Hindi. Conversational in Korean.