# MEDHA BULUMULLA

## 

**OBJECTIVE** 

To utilize my analytical, computational and web design skills to find innovative solutions

#### **EDUCATION**

## Cornell University

Bachelor of Science, Information Science, Data Science Concentration

Aug 2020 - May 2023

Major GPA: 3.8; Cumulative GPA: 3.6

Master of Professional Studies, Information Science, Data Science Concentration

Jan 2023 - Dec 2023

Relevant Courses

- Intermediate/Introductory Design & Programming for the Web, Human-Computer Interaction, Data-Driven Web Applications, Object-Oriented Programming & Data Structures, Introduction to Computer Science, Networks, Consequences in Computing, Communication & Technology, Building Inclusive Computing Organizations, Data Mining & Machine Learning, Introduction to Data Science, Probability Models and Inference, Biological Statistics I-II, Calculus I-III, Linear Algebra.
- Spring 2023: App Design & Prototyping, Product Management, Computational Sustainability, Interactive Data Visualizations.

#### Course Projects

- Created an interactive world map on Olympic Medals and a static visualization on Chocolate Consumption using D3.js in a three-person team collaborating on GitHub.
- Developed a Python model using statistical methods analyzing food insecurity, socio-economic, and health indicators to predict COVID-19 vaccination rates in a four-person team collaborating on GitHub.
- Designed and implemented a store website for my small business using PHP, SQL, CSS, and HTML.

### Skills

- Languages: Java, Javascript (D3.js), PHP, SQL, Python (NumPy, pandas, Matplotlib, BeautifulSoup, Python Record Linkage Toolkit, GeoPy), SPSS, SAS, R, CSS, LaTeX, HTML.
- Miscellaneous: GitHub, Visual Studio Code, Jupyter Notebook, AndroidStudio, Tableau, Excel

#### WORK EXPERIENCE

Webmaster Jan 2021  $\sim$ 

Cornell University, College of Agriculture and Life Sciences

• Redesign and add relevant content using HTML, CSS, JavaScript, and Bootstrap for three research groups.

Research Assistant Jan 2021  $\sim$ 

Cornell University, Dyson School of Business

- Developed a Python user guide, website, and educational modules to teach predicting malnutrition and poverty in the Global South utilizing Multivariate Random Forest Method.
- Data cleaning, analysis, merging, matching individuals and calculating travel distances of private and public food assistance data using Python.
- Utilized dataset collection and machine learning techniques to develop and write a regular flagship publication in a team of 30 researchers from various institutions.

#### Teaching Assistant, Design & Programming for the Web

Aug 2021 - Dec 2022

Cornell University, Ann S. Bowers College of Computing and Information Science

- Instruct students in SQL, PHP, HTML, CSS, and back-end/front-end web design.
- Co-lead a discussion section for 15-25 students, hold office hours, and grade assignments every week.

## Research Intern

June 2022 - Aug 2022

Southern African Institute for Policy and Research, Zambia

- Research and proposal writing about Small, Micro and Medium Enterprises in Zambia.
- Wrote website accessibility and effectiveness report.