DANA ROCHA

dbridgette.rocha@gmail.com | linkedin.com/in/rochadana | github.com/dana-rocha | dana-rocha.com

TECHNICAL SKILLS

Languages & Frameworks: **Python** (Apache Airflow, Flask), **JavaScript** (React, Material UI), **HTML**, **CSS** (Materialize), **SQL**, **R**
Tools & Platforms: Git, GitHub, VS Code, Unix/Linux, Docker, RStudio, Firebase
Databases: PostgreSQL, MongoDB, Google Firestore

WORK EXPERIENCE

Allen Institute **Seattle, WA**
Data Analyst I - Allen Institute for Brain Science ***Mar 2023 – Present***

- Currently designing and implementing an automation solution for a cloud-based data processing pipeline using Apache Airflow and Python, collaborating with software engineering team to ensure scalable, efficient solutions
- Enhanced an internal Python package by adding a method to streamline data report exports and updated SQL queries to include richer metadata, improving visibility into data processing outputs
- Developed a user-friendly web application using Shiny, optimizing weekly data analysis by 30% through automated data updates and expedited access to metadata across multiple modalities
- Improved front-end features across 10+ Shiny web applications that centralize data extraction, visualization, and analysis through close collaboration with stakeholders
- Directed internal programs and events, promoting employee engagement and alignment with organizational objectives for 2024-2025

Software Engineer Intern - Allen Institute for Neural Dynamics ***Aug 2022 – Jan 2023***

- Led end-to-end development of a Minimum Viable Product (MVP) web application, which helped the organization realize the need to adopt an alternative solution for data sharing
  - Designed a responsive front-end user interface using React components and a service layer for REST API queries
  - Synthesized requirements from stakeholders and produced wireframes to guide web application design
  - Implemented unit tests, test automation, and continuous integration through Jest, ESLint, and GitHub Actions
- Added credential file automation to an open-source Python package, simplifying secure resource access
- Integrated dataset search via third-party REST API in an open-source Python package, streamlining data discoverability
- Incorporated features for JSON schema validation and export into an open-source Python package, allowing users to define reusable metadata templates

Merck & Co. **Boston, MA**
Informatics Intern ***Jan 2020 – Aug 2020***

- Trained machine learning models to predict high-value compounds for early-phase testing, supporting data-driven decisions for three active drug discovery teams
- Built ETL pipelines using SQL, Pipeline Pilot, and PilotScript to integrate data from public and internal sources, enabling downstream analysis and supporting data-driven decision making across the organization
- Presented monthly data insights to 50+ stakeholders, ensuring alignment with strategic objectives

TECHNICAL PROJECTS

Room Reservation System, Capstone project – **GitHub** | **Demo** ***Aug 2022***
Web application to track room reservation information - developed with JavaScript, React, Google Firebase

- Collaborated closely in a two-person team to design, develop, and successfully deliver the project
- Wrote backend logic, database endpoints, and secure user authentication
- Crafted algorithms to create, delete, and prevent double-booking of reservations
- Established a responsive user interface of 3 pages utilizing Materialize and React Router for optimal user experience

Inspiration Board, Group project – **GitHub** ***Jul 2022***
Web application where users can leave "sticky notes" on digital boards - developed with JavaScript, React, Python, Flask

- Led a four-person team to deliver an interactive web app for creating, reading, and deleting boards and notes
- Constructed two React components that enable users to like or delete a note and display notes from a selected board

EDUCATION

Ada Developers Academy **Seattle, WA**
Full Stack Web Development & Computer Science Fundamentals ***Mar 2022 – Jan 2023***
Technologies: Python, JavaScript, SQL, PostgreSQL, Flask, React

Northeastern University **Boston, MA**
B.S. in Biochemistry, M.S in Bioinformatics ***2018, 2020***
Relevant Courses: Algorithms, Data Mining/Machine Learning, Python Programming