Marcel Mateos Salles

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EDUCATION

Brown University, B.S. Computer Science-Economics

Providence, RI

• **GPA:** 4.00/4.00

Expected Graduation May 2026

• Relevant Courses: SWE, Data Structures & Algorithms, Discrete Math, OOP, Deep Learning, Comp. Ling. (NLP), Logic for Sys.

PROJECTS

Little Label Learners (School) - Python, Tensorflow, Keras, Numpy

May 2024

- Pioneered the development of a biology-mimicking deep learning model that enhances adaptability and minimizes data requirements
- Implemented a seamless transition from self-supervised to semi-supervised learning, along with dynamic category introduction
- Demonstrated ability to outperform purely self-supervised learning while coming within 10% of fully-supervised learning

SpacePals (Personal) - Python, Javascript, React, CSS, GraphQL

Feb 2024

- Spearheaded development of webapp that allows users to "capture" different space animals by taking pictures of them
- Engineered frontend system that's updated in real-time as the backend utilizes CLIP to classify the image taken
- Integrated GraphQL to establish efficient communication between the frontend and backend systems

SpotiDuo (School) - Java, Python, Typescript, CSS, React, Spark

Dec 2023

- Built a webapp that allows users to learn languages by listening to songs in other languages by filling in lyrics to reinforce listening
- · Led the backend team and designed architecture for interaction between frontend and backend
- Utilized Spotify API to get metadata from songs and developed a recommendation algorithm to prompt users with new songs

WORK EXPERIENCE

Brown University Providence, RI

Researcher - Balestriero Lab

Oct 2024 - Present

- LoRA Users Beware: A Few Spurious Tokens Can Manipulate Your Finetuned Model (https://arxiv.org/abs/2506.11402)
- Researching spurious correlation in large language models and building techniques to detect and remove it
- Developing an extensive open source library allowing users to customize large language models to use in their own research

Pinterest Palo Alto, CA

Software Engineer Intern

May 2025 – Aug 2025

- Owned creation of DevAI observability tool leveraged by all 2000 engineers, reducing MTTR by 30 min per engineer per use
- Drove end to end development of an MCP server and RAG system that securely exposes internal tools and knowledge to AI agents
- Trained a novel anomaly detection model from unstructured and unlabeled system logs, decreasing rate of false negatives by 20%

Brown University Providence, RI

Teaching Assistant - Deep Learning

Dec 2024 – May 2025

- Develop and teach lectures to 200+ students covering complex deep learning techniques and research papers
- Host office hours to debug students' code, explain lecture/assignment content, and mediate collaboration among students

Dexcom San Diego, CA

Software Engineer Intern

Jun 2024 – Aug 2024

- Worked in mobile development team, designed mobile architectures and application for an iOS and Android app
- Conducted market research and developed three novel features for CGMs, unlocking new market of 700k users
- Developed a dynamic algorithm leveraged throughout Dexcom's software suite, specific to the needs of the new 700k stakeholders

EXTRACURRICULAR ACTIVITIES

Brown University Men's Swimming and Diving

Providence, RI

NCAA Division I Student-Athlete, Diving Team Captain

Aug 2022 - Present

- Balance 25-hour training weeks, competitions, and travel while managing a full academic workload
- Lead a group of ten divers through workouts, fostering team cohesion and motivation while coordinating all team communication

SKILLS & INTERESTS

- Languages: Native proficiency in Spanish and English
- Programming Languages: Java, Python, Javascript, Typescript, R, Stata
- Technical Skills: NumPy, API & Server Dev, Git, Spark, Kubernetes, Pytorch, Machine Learning, AWS, System Arch, Agile, React
- Interests: Cycling, Hiking, Fantasy Novels, Trying new foods, Traveling, Indie Music