Rodrigo Bressan

SKILLS

Languages and Go, Python, Java, Typescript/JavaScript, SQL (MySQL, Postgres), NoSQL (Mongo, DynamoDB, Redis), React,

Frameworks Angular, NodeJS, Django, Spring

Tools AWS, Terraform, Docker, Kubernetes, Git, Argo

Methodologies Agile, Scrum, Testing (TDD, Unit Tests, Cypress), Clean Code (SOLID, DRY)

Natural Languages Portuguese (Native), English (Fluent), Italian (Fluent)

WORK EXPERIENCE

Full Stack Engineer Empatica - Italy Jul 2020 - Oct 2022

- Built REST and gRPC APIs with Go, deployed on AWS with Kubernetes and Terraform
- Implemented features on front-end applications using **React** and **Angular** frameworks
- Improved APIs with caching and SQL indexes optimization, reducing server response times by ~35%
- · Re-designed an existing data lake using a serverless approach, improving costs, scalability and data retrieval times
- Led the adoption of code quality metrics, increasing overall code coverage to 80%
- · Led the mapping and documentation of the existing infrastructure using the C4 model framework
- · Participated on the hiring and onboarding processes, while also mentored other junior engineers

Software Engineer

Bill & Melinda Gates Foundation - Brazil

Jul 2018 - Jun 2020

- Mentored software + data engineers on software engineering topics (clean code, testability, CI/CD, dockerization)
- Setup infrastructure for data engineers, allowing them to quickly test, evaluate and deploy Machine Learning models
- Led the adoption multithreading/parallelism techniques, improving performance of existing ETL pipelines by 70%
- Led the migration of a monolith to microservices based one, reducing deployment times by 30%
- · Built ETL pipelines from scratch using Python, Pandas, MySQL and Postgres databases

Software Developer

Cleevio - Czech Republic

May 2016 - Dec 2017

- Led the migration of Android apps from **Java** to **Kotlin**, allowing code re-usage across Android and iOS platforms
- Introduced Test Driven Development methodology, resulting in quicker iteration cycles between developers and QA
- · Defined a set of architectural models to be adopted, resulting on more modular and testable components

Software Developer Movile - Brazil Jan 2014 - Jul 2015

- Built native Android applications, integrating with REST APIs, along with CI/CD to app stores
- · Developed an integration between a CMS and third party providers, automating an existing manual task

EDUCATION

Federal Institute of Technology of São Paulo, Computer Science

• Minor on Data Science and Artificial Intelligence, with academic research contributions to biometrics and computer vision

PERSONAL/OPEN SOURCE PROJECTS (More available on personal GitHub)

Ponteltalia (website): Find information about your ancestors using Italian government birth records (Python, React, MySQL, AWS)

Face2Data (code): Retrieve information from a person based on its face(Python, React, Keras, AWS, Neural Networks)

Entity Embeddings (code): Discover hidden relationships on categorical data using entity embeddings (Python, React, AWS)

DigiPathos (code): Retrieve plant diseases datasets from Brazilian Agricultural website through CLI or APIs (Python)

PADify (code): Identify forged facial biometric samples with Neural Networks (Python, Keras, TensorFlow)

TMDB App (code): Showcase of clean, modular and testable architectures for Android applications (Java, Kotlin)

EasyPost-Go (code): Buy UPS and FEDEX shipment labels using EasyPost APIs (GoLang)

OTHERS

- Best presentation award from Brazilian Institute for Space Research on "Identifying Security Management State of Art using NLP"
- · Volunteer work on biometrics research along with UNICAMP and Technologic Federal Institute of São Paulo
- Volunteer work on Infant mortality study by The Bill & Melinda Gates Foundation (later on hired as a full-time collaborator)
- Personal Interests: biometrics, computer vision, system design, cycling, climbing, natural languages, cooking, academic research