

ELIÃ RAFAEL DE LIMA BATISTA

77-992-5544 | o.elia.batista@gmail.com | linkedin.com/in/e-batista | elbatista.github.io

PhD Candidate in Informatics at University of Lugano (USI)

6963 Pregassona, TI, Switzerland

Working Permit: Swiss Permit B | Available for Relocation, Remote Work or Hybrid

EDUCATION

Ph.D. in Informatics

Università della Svizzera Italiana (USI)

2021 – Feb 2026

Lugano, Switzerland

M.Sc. in Computer Science

Pontifical Catholic University of Rio Grande do Sul (PUC-RS)

2018 – 2020

Porto Alegre, Brazil

B.Sc. in Computer Science

Pontifical Catholic University of Rio Grande do Sul (PUC-RS)

2006 – 2011

Porto Alegre, Brazil

PROFESSIONAL SUMMARY

Software engineer and researcher with over **10 years** of experience designing and implementing high-performance software and fault-tolerant systems. Currently a **Ph.D. candidate** and researcher at Università della Svizzera Italiana (USI) in Lugano, Switzerland, specializing in distributed systems. Proficient in **Java, Node.js, Go** and **Python** for back-end development, and skilled in **ReactJS, Next.js**, and **React Native** for front-end and mobile applications. Experienced in **Linux environments, system optimization**, and **leading development teams**. Passionate about building robust systems that connect cutting-edge engineering with real-world impact.

PROFESSIONAL EXPERIENCE

Research and Development

Università della Svizzera Italiana (USI)

2021 – Feb 2026

Lugano, Switzerland

- Conducted **research and development** in distributed systems using **Java, Go, Python, C, and Bash** on **Linux** environments. Administered a **Linux cluster**, developed core replicated systems components focusing on **performance** and **fault tolerance**, and authored research papers for top distributed systems conferences. Also a **Teaching assistant** for Operating Systems, Systems Programming, and Distributed Algorithms courses.

Senior Software Developer

Compasso UOL

2017 – 2020

Brazil, RS

- Led the development and developed scalable full-stack web applications using **ReactJS** and **Node.js**, contributing to architecture decisions and continuous integration workflows.
- Built and maintained cross-platform mobile applications with **React Native**, integrating secure and performant **RESTful APIs** for enterprise clients.
- Collaborated with UI/UX designers to implement responsive, user-centric features, improving engagement and usability across platforms.
- Contributed to **Agile** processes (**SCRUM**), code reviews, and mentoring of junior developers in modern JavaScript and mobile best practices.

System Analyst

Bem Promotora

2014 – 2017

Brazil, RS

- Developed and maintained **ERP modules** for a credit payroll loan financial company linked to Banrisul, a major bank in Southern Brazil.

- Analyzed, documented, and communicated new system features to the development team to improve business process efficiency.
- Implemented complex business rules and data processing using **SQL Server** stored procedures for accurate loan management and reporting.

Software Developer

2010 – 2013

DBServer

Brazil, RS

- Developed and customized ERP modules using **Microsoft Visual Basic** tailored for a major fuel retail network (Ipiranga) in Brazil, improving operational efficiency and sales tracking.
- Integrated and managed backend logic with **SQL Server** for efficient data storage and retrieval.

Software Developer

2008 – 2010

Vensis

Brazil, RS

- Built and maintained general-purpose ERP modules with **Microsoft Visual Basic**, adaptable for various enterprise environments.
- Optimized **SQL Server** queries and stored procedures to boost system performance and data consistency.

SKILLS

Languages: English (fluent), Italian (intermediate), Portuguese (native).

Programming Languages: Java, JavaScript/TypeScript, HTML/CSS, C/C++, SQL, Go, PHP, Visual Basic.

Frameworks & Methodologies: ReactJS, Node.js, React Native, Next.js, Agile, SCRUM.

Developer Tools & Platforms: Git, Maven, Gradle, REST APIs, VS Code.

Databases & Storage: SQL Server, PostgreSQL, MongoDB, MySQL, Firebase.

Cloud Services: Firebase (Hosting, Auth, Functions), Basic knowledge of AWS cloud services

Distributed Systems: State Machine Replication, Multicast Protocols, State Management, Blockchains.