

Personal information

Moaz Reyad Genova, Italy <https://www.linkedin.com/in/moaz-reyad-7582255>

Gender Male

WORK EXPERIENCE

September 2024 – NOW

CollaboratorCMCC
<https://cmcc.it/>, (Bologna, Italy)

September 2022 – May 2024

Postdoctoral ResearcherDePaul University Jarvis College of Computing and Digital Media
<https://www.cdm.depaul.edu/>, (Chicago, USA)I am a Postdoctoral Researcher in [the DePaul DICE Lab](#) on a project funded by [NASA AIST program](#).

October 2021 – August 2022

Senior Software DeveloperLuxoft
<https://www.luxoft.com/>, (Italy)

I work as a senior C++ engineer for the next generation Autonomous Driving project with a German car manufacturer.

September 2019 – August 2020

Post-Doctoral ResearcherLIG, University of Grenoble
<http://www.liglab.fr/>, (France)I work in LIG lab as a post-doctoral researcher on the topic of data cleaning and integration in collaboration with a start-up. We performed a state-of-the-art survey for available solutions, then selected the most suitable systems and explored them in more detail. I developed a prototype in [Java](#) to help in data cleaning in spare parts. I developed a generic benchmark using [JUnit](#). The prototype and benchmark expose their functions using REST API using [Spring](#). The technical reports and the prototype code were stored in a [git](#) repository. I was teaching two database courses for Master's students: one in [Master of Science in Informatics at Grenoble \(MoSIG\)](#) and the other in [Master of Science in Industrial and Applied Mathematics \(MSIAM\)](#). I was helping with the supervision of a Master's student who works on identifying spare part reference numbers using regular expressions and a deep learning LSTM network.

July 2018 – July 2019

Post-Doctoral ResearcherDIBRIS, University of Genoa
<https://www.dibris.unige.it/>, (Italy)

I work in the FINSEC lab, which solves research and development problems in the area of machine learning and security. The lab collaborates with other partners on big European projects. We also study new technologies such as blockchain.

March 2016 – June 2018

Research Fellow

National University of Singapore, School of Computing
www.comp.nus.edu.sg, (Singapore)

Working in the [database system group](#) with Prof. Beng Chin Ooi. The database system research group conducts research in different data and AI projects. For instance, we develop the open source [Apache SINGA](#) project, which is a deep learning library and [Gemini](#) project for applying machine learning in the healthcare domain. I am in the [Project Management Committee](#) of the Apache SINGA deep learning library. I made SINGA available on [Amazon AWS marketplace](#) through Linux and Windows machines. I also contributed to the documentation on the website, Jupyter Notebooks, and video tutorials. My work in the healthcare project was presented at the Clinical Artificial Intelligence in the Age of Precision Medicine 2017 workshop at the National Health Hospital in Singapore. I also contributed to the definition of provenance and relational mapping for a storage engine for blockchain systems. I recently worked on some tasks related to providing AI as a service through a deep learning RESTful web interface and supporting the [ONNX](#) open neural network exchange format.

December 2015 – February 2016

ICT Consultant

DI.GI. International S.p.A.
www.digi.it, Milan (Italy)

I was developing smart and big data solutions using the Mantra platform. I worked with big data technologies such as Hadoop (MapReduce), HDFS, HBase, Spark, and Oozie. I used smart data processing tools within the Mantra platform, such as regular expressions, natural language processing, data extraction, and transformation. I also participated in the design of user dashboards for the end user. The goal of our work is to develop a business intelligence solution that analyzes big data from online web stores and provides useful dashboards that can help with decision-making.

March 2015 – August 2015

R&D Manager

TC-Bit
www.tc-bit.com, Trento (Italy)

Responsible for managing and technical leading a development team of engineers to deliver various innovative technology products. The projects that I was responsible for managing covered a wide range from back-end database projects (using databases such as Oracle, PostgreSQL and MySQL) and front-end web development projects (using technologies such as PHP and JavaScript) to sensors and hardware projects (e.g., Arduino) using different programming languages (including C++, Java, and MATLAB). We used modern management methodologies such as Agile, SCRUM, and Kanban to ensure the fast development of high-quality products. I was also responsible for writing documents such as software development guidelines and ensuring their successful implementation.

September 2008 – October 2010

Research Assistant / Software Area Manager

University of Trento
Via Sommarive 14, 38123 Povo-Trento (Italy)

I was an area manager in the knowdive research group where I was responsible with my team for designing, implementing and testing some parts of a semantic engine core with Java and C++.

May 2008 – August 2008

Senior Software Developer

International Turnkey systems
www.its.ws, Cairo (Egypt)

Developed software modules in the telecommunication area for mobile phone operators

October 2007 – April 2008

Validation Engineer

Valeo
www.valeo.com, Cairo (Egypt)

Developed C# scripts for validation of automotive control units

October 2005 – September 2007

Software Engineer

SoftMEMS

www.softmems.com, Cairo (Egypt)

Design and implement cross-platform tools (Windows/Linux) for 3D modeling and visualization of MEMS using C++, Qt and OpenGL libraries.

April 2004 – September 2005

Software Engineer

Tradigital

www.tradigital.de, Cairo (Egypt)

Developed and tested software for processing and visualize Arabic script using C++.

EDUCATION AND TRAINING

November 2010 – April 2015

PhD in Information Technology

My research interests include provenance, data aggregation, scalability, and tuning of large-scale databases.

Department of Information Engineering and Computer Science

University of Trento, Italy

2005 – 2006

Post-graduate Diploma in Control Systems

Faculty of Engineering, Ain Shams University. Cairo, Egypt

1998 – 2003

B.Sc. Computer and Systems Engineering

Faculty of Engineering, Ain Shams University. Cairo, Egypt

AWARDS

June 2024

ACM SIGMOD Systems Award 2024 for the work done on Apache SINGA.

PERSONAL SKILLS

Mother tongue

Arabic

English

Italian

Understanding		Speaking		Writing
Listening	Reading	Spoken interaction	Spoken production	
C1	C1	C1	C1	C1
B1	B1	B1	B1	B1

: A1/A2: Basic user - B1/B2: Independent user - C1/C2: Proficient user
Common European Framework of Reference (CEF) level

Communication skills

- Teamwork: I have worked in a multi-national research group with students and graduates from different cultures.

Organizational / managerial skills

- Mentor for The Apache Software Foundation in [Google Summer of Code 2019](#).
- Session Lead at [EU-Fossa 2 Hackathon](#) in Brussels on May 4th-5th 2019.
- Attended IEEE Italy Section School of Career-Boosting 2015, which is counted as a certified project management education for PMI's Certified Associate in Project Management (CAPM).
- Before my PhD I managed a team of five software developers and master students to design and implement parts of a semantic engine core with Java and C++.

Computer skills

- Programming and databases: C/C++, Python, Visual Basic, C#, Java, $\LaTeX$, HTML, JavaScript, PHP, XML, ASP, UML, SQL, Sybase Power Designer, MS SQL Server, MS Access, PostgreSQL, SQLite and MySQL. - Operating systems: Windows, UNIX and Linux. - Testing: Rational Purify and Parasoft C++Test. - Documentation: Javadoc, Doxygen tool for C++ and C# XML Documentation.

Other skills	Running: in 2019, I completed 13km at CorriGenova and Trento Half Marathon .
Citizenship	Italian, Egyptian
Driving license	Italian (B)

ADDITIONAL INFORMATION

Professional Membership	Member of Association for Computing Machinery since 2023. Member of Egyptian Engineering Syndicate since 2003
Organization	Organizing committee member of ICNLSP 2019 . During my PhD I organized the weekly seminar series of the research group.
Publications	- 'Efficiently Reducing Storage Footprint in Reproducible Containers via I/O Specialization'. Rohan Tikmany, Prashant Kumar, Aniket Modi, Raffay Atiq, Moaz Reyad, Ashish Gehani and Tanu Malik. The 24th IEEE/ACM International Symposium on Cluster, Cloud and Internet Computing 2024. - 'Querying Container Provenance'. Aniket Modi, Moaz Reyad, Tanu Malik, Ashish Gehani. Companion Proceedings of the ACM Web Conference 2023 - 'Rafiki: Machine Learning as an Analytics Service System'. Wei Wang, Sheng Wang, Jinyang Gao, Meihui Zhang, Gang Chen, Teck Khim Ng, Beng Chin Ooi, Jie Shao, Moaz Reyad. VLDB 2019 (http://www.vldb.org/pvldb/vol12/p128-wang.pdf) - 'Managing language diversity across cultures: the English-Mongolian case study'. Amarsanaa Ganbold, Oyundari Nyamdavaa, Feroz Farazi, Moaz Reyad, Fausto Giunchiglia. International Journal On Advances in Life Sciences, v 6 n 3 and 4 2014 - 'Provenance in Open Data Entity-centric Aggregation'. Fausto Giunchiglia and Moaz Reyad. Poster paper at ProvenanceWeek 2014, Cologne, Germany.
Links	- Google Scholar: https://scholar.google.it/citations?user=AUe7hCIAAAAJ - DBLP Page: http://dblp.uni-trier.de/pers/hd/r/Reyad:Moaz - Github: https://github.com/moazreyad - Coderbyte: https://coderbyte.com/profile/MoazReyad - kaggle: https://www.kaggle.com/moazreyad - ORCID: https://orcid.org/0000-0002-1172-5715