

Federico Caimi

3947 N Sacramento Ave - Chicago, IL, 60618
(312) 890-3714 - fedeoasi@gmail.com

Work Experience

- 01/22 - Present **Senior Engineering Manager**, RVO Health (formerly Rally Health/Optum), Chicago (Remote), USA
- Delivered the rewrite of the Quit for Life smoke cessation program on the Coaching Platform
 - Collaborated with business and product owners to significantly improve the intake process
 - Managed three teams, one directly and two as senior manager
 - Created a team culture where people speak up in one on ones and retrospectives
 - Hired talented Scala and UI engineers to combat high attrition experienced during two company transitions (Rally Health to Optum, and Optum to RVO Health)
- 03/21 - 01/22 **Principal Software Engineer**, Rally Health, Chicago (Remote), USA
- Worked on the Coaching Platform, which offers programs to make people healthier
 - Extended and enhanced registration flows to support the direct to consumer model
 - Used Scala libraries such as shapeless to implement safeguards that catch errors at compile time
 - Architected features touching several microservices, coordinating across multiple teams
 - Helped the broader organization improve the ticket-writing and grooming practices
 - Managed a team of eight people with five direct reports and performed on-call operations
- 02/19 - 3/21 **Lead Software Engineer**, HERE Technologies, Chicago, USA
- Worked on creating high-definition maps from sensor data
 - Created batch and streaming systems capable of computing map attributes at a continental scale
 - Managed a team of nine people, with six direct reports
 - As product owner, worked on defining and clarifying requirements based on customer feedback
 - Extensively used TDD, pair programming, and other Agile methodologies
- 09/16 - 02/19 **Senior Software Engineer**, HERE Technologies, Chicago, USA
- Taught Scala and functional programming to a team of developers, who then embraced both
 - Wrote Spark jobs to perform spatial data transformations at scale
- 01/15 - 09/16 **Software Engineer II**, Backstop Solutions Group, Chicago, USA
- Developed an accounting system as a service using Scala.
 - Used JVM profiling (for Java and Scala applications) to find bottlenecks and improve performance of build jobs and applications by an order of magnitude
 - Performed on-call operations and managed server configuration using Puppet
- 06/12 - 01/15 **Software Engineer I**, Backstop Solutions Group, Chicago, USA
- Maintained and developed new features on a Java web application with Accounting and CRM functionality for alternative asset management (hedge funds, pensions, foundations)

Education

- 2012 **M.Sc. Computer Science**, University of Illinois at Chicago, USA
- 2012 **M.Sc. Computer Engineering**, Summa Cum Laude, Politecnico di Milano, Italy
- 2010 **B.Sc. Computer Engineering**, Politecnico di Milano, Italy

Technical

Languages: Scala (expert), Java (experienced), R (intermediate), Javascript (intermediate)

Frameworks: Play framework, Akka, Spark, Flink, Stripes, Hibernate, Slick, Guice

Database Systems: Oracle, Postgres, MySQL

Scala Libraries: Shapeless, Cats, Monocle, Play, Json4s (contributed a few commits), Akka Streams, Scalatra

Other technologies: Kafka, RabbitMQ, Kubernetes, ElasticSearch, Docker

Personal Projects

- 2018 **FileSystemTools** (<https://github.com/fedeoasi/file-system-tools>) **A set of command line tools to help organize a file system.** The main use case is to manage an external hard drive or a backup folder: keeping it clean (deduplication of files and folders), but also efficiently finding files and computing statistics.
Technologies: Scala, Spark, Akka Streams
- 2015 **LearnBySubtitles, A web-app search through the contents of subtitle files (.srt).**
Implementation of a web application that allows a user to search for a word or phrase through the contents of subtitle files. This has mainly two purposes: 1. help learners of a foreign language to see how words and idioms are used in movies and TV shows (like an enhanced vocabulary). 2. Allow an advanced movie search based on dialogue and language features.
Technologies: Scala, Play Framework, Slick, SBT, ElasticSearch

Publications

- 2012 Building Linked Ontologies with High Precision Using Subclass Mapping Discovery**, *Isabel F. Cruz, Matteo Palmonari, Federico Caimi, Cosmin Stroe*, Artificial Intelligence Review, 2012.

Presentations

- 2011 AgreementMaker Ontology Matching System OAEI 2011 Participation.** Given a technical presentation about the AgreementMaker system at the Ontology Matching workshop in the International Semantic Web Conference, Bonn, Germany, October 2011.

Other Skills

Social skills and competences: Natural propensity for teamwork. Excellent communication skills. Experience leading across different cultures. Propensity to lead by example. Empathetic leadership. Excellent analytical, design, and problem solving skills.