Òscar Vilaplana

Experience

Senior Software Engineer SpotMe

2014-Present Lausanne, Switzerland

Responsible for SpotMe's **server infrastructure** and **backend**, which serves **tens of thousands of users per month** in hundreds of high-profile business events.

- Evolved the **backend architecture** to remove single points of failure, allow **clustering**, provide **high availability** and off-load heavy tasks to a **Redis**-based **task queue**, which eliminated the causes of most of the system's downtime and slowness.
- Developed a database redundancy daemon to provide fault tolerance on top of our custom CouchDB servers.
- Developed several NodeJS APIs to easily maintain, replicate and archive SpotMe's event databases.
- Automated the build and deployment, using Ansible, Docker and Jenkins, which
 reduced the build and deployment time by 70% and allows for Continuous
 Deployment.
- Developed **monitoring tools** to track and respond to anomalies in SpotMe's database, backend software or infrastructure, using **Go**, **Python**, Datadog and Logentries.

Software Architect Senior Software Engineer Paylogic

2011-2014 2009-2011 Groningen, Netherlands

- Designed and led the development of Paylogic's distributed, decentralized, fault-tolerant virtual queue system, which has been used successfully for several years queuing hundreds of thousands of users simultaneously.
- **Designed** and **led the development** of the Paylogic Ticketing API, a discoverable, self-documenting **REST API**.
- Developed the team's competence in Software Architecture through talks, mentoring and collaboration.
- Introduced **Agile**, **Scrum** and development best practices.
- Collaborated on the development of Paylogic's Django ticketing application.

Co-Founder Helpdesk

2008-2009 Barcelona, Catalonia

Began a startup to provide efficient issue management for small businesses.

- Built a Django payment processing library to process payments on Wirecard and Paypal.
- Built an e-mail indexing system using Django and Solr.
- Built a HTTPS broadcast server for sales monitoring, using **Twisted**.

Skills

Programming

Go Python NodeJS PHP Perl

Databases

CouchDB MySQL PostgreSQL DynamoDB Redis ElasticSearch RethinkDB

Infrastructure

Ansible Docker AWS

Libraries

AngularJS ExpressJS Django SQLAlchemy py.test Jasmine Docker

Engineering

Software Architecture Agile Scrum REST Continuous Integration Domain-Driven Design

Education

BS Computer Science

UOC, 2007

Senior Software Engineer Local Billing, Ltd.

2007-2009 Barcelona, Catalonia

Responsible for LocalBilling's **PHP payment gateway** integrated with several banks and payment providers and capable of handling thousands of simultaneous payments.

- Developed LocalBilling's subscription manager and **fraud control** software.
- Developed a credit card **encryption daemon** to store credit card numbers securely in accordance with the requirements of the **PCI** certification.

Software Engineer Desertic

2006-2007 Vilanova i la Geltrú, Catalonia

- Developed and maintained a J2EE web application for business management using Tomcat and Oracle.
- Maintained a J2EE application for the detection and prevention of money laundry.

Software Engineer Netfocus

2002-2006 Barcelona, Catalonia

- Designed and developed a responsive web application for the management of the firm's customer data using J2EE/JBoss.
- Worked on building Linkat, a SuSE-based GNU/Linux distribution, by customizing and packaging open source applications, using RPM.
- Designed an invoice reconciliation system.
- Built a Java library to interface with Lotus Notes over HTTP.
- Managed a SeeBurger EDI station.
- Built various ad-hoc Perl tools for data analysis and report generation.

Talks

- RethinkDb 2015
- CoreOS and Kubernetes
- Lean: 2014 Validated learning
- Python at scale
- Architecture:Risk-Based Design
- Continuous 2013Deployment
- Handling massive traffic with Python
- Agile User Stories
- Celery 2012
- Agile Estimation
- Tornado in Depth
- Scrum: 2011 Getting Started
- ZeroMQ

Languages

English FLUENT
Catalan NATIVE
Spanish NATIVE
Dutch PROFICIENT
Italian LIMITED
French ELEMENTARY