



# ÉRIC NICOLAS

## SOLUTIONS ARCHITECT



## ABOUT ME

I am a strategic, detail-oriented problem solver with a keen and analytical mind, driven by a passion for innovation. My experience has taught me that a project's value lies in accurately identifying and contextualising the objectives to achieve—this is where I make the greatest impact.

In designing systems, I believe that clarity and elegance are key to lasting relevance: I am a stalwart advocate of radical simplicity and empower my collaborators to strive for creative solutions that will remain effective and adaptable.

## TOP SKILLS

AWS Platform ◇ Arch. Design  
Git Surgery ◇ Linux Sys. Admin.  
DevOps ◇ TypeScript ◇ Java  
Documentation ◇ DB Admin.  
Web Dev. ◇ Communication  
Code Quality ◇ Organisation

## EDUCATION

### Engineer's Degree

in **Network Security**

Upskilled in the Java language by Rémi FORAX, major contributor to its expansion.

Awarded with the greatest distinction. Graduated top of class.

### Licentiate's Degree

in **Computer Science**

Awarded with the greatest distinction. Graduated top of class.

### Bachelor's Degree

in **Applied Physics for Electronics**

Awarded with the greatest distinction. Graduated top of class; top 0.4% nationwide.

## ENDORSEMENTS

### Christian POPESCU

**Senior Software Engineer**

Éric showed obvious technical skills and remarkable abstraction capacities.

I trust in his technical and human skills.

### Étienne DURIS

**University Professor**

Éric is a hard-working person, tackling all assignments with dedication.

I highly recommend him, he is a team player and would make a great asset to any organization.

## EXPERIENCE

### Principal Software Engineer at Unite (remote position)

Nov. 2022 – Present (2 years, 7 months)

Leipzig, Germany

Enabling our feature teams to focus on delivering functionality in the trying context of reinventing a B2B e-procurement platform grossing 500 million euros a year.

Mentored a junior IT developer in 2023 and 2024.

### Solutions Architect at NCLS Development (freelance entrepreneur)

Dec. 2014 – Present (10 years, 6 months)

Brittany region, France

Designed the entirety of the services that make up an enterprise EHS solution trusted by the French national employment agency since 2016.

### Software Engineer at Propellerhead

Dec. 2013 – Dec. 2014 (1 year, 1 month)

Auckland, New Zealand

Co-designed and implemented the engine responsible for parsing and semantically classifying 160+ years of heterogeneous historical data.

Project highlighted by the W3C as one of the foremost examples for their Data on the Web Best Practices publication released in 2017.

### Project Manager at Gaspard Monge Institute

Sep. 2012 – Mar. 2013 (7 months)

Paris area, France

Led a team of 5 junior IT engineers implementing a proof-of-concept solution for a research project of the institute.

### Software Engineer at Safran Aircraft Engines

Sep. 2010 – Sep. 2013 (3 years, 1 month)

Île-de-France, France

Interfaced with physicists to implement real-time ports of cutting-edge signal processing algorithms in the demanding context of aircraft and rocket engines.

Mentored a junior IT engineer from 2011 to 2013.

### Apprentice Product Owner at Site Alpha, Planon group

Sep. 2008 – Sep. 2010 (2 years, 1 month)

Paris area, France

Handpicked by our CEO to elaborate with him specification documents for the company's new flagship product.

2024

**Steered project back on track to meet crucial deadline**

I led the initiative to revise the design of a project gone off-course and coordinated the efforts to deliver on time a future-proof solution that would address the imminent amendments to the Visa compliance mandate.

-----◇◇◇ corrected course of project ◇◇◇ with under **3 weeks**  
of **6 months'** lead time ◇◇◇ before pivotal cutoff date

2023

**Spearheaded redesign of dysfunctional payment workflow**

I drove the complete overhaul of the procedure and architecture of the credit card payment system at a major B2B e-procurement platform, and provided a working implementation that purged accidental complexity and addressed discovered vulnerabilities.

-----◇◇◇ reduced code base ◇◇◇ for a platform handling annually  
by about **96%** ◇◇◇ **billions of euros** in transactions

2020

**Resolved performance bottleneck in data computation engine**

I proposed to better leverage a customer's database engine and pair intricate SQL queries with savvy and straightforward API design to break the impasse of a solution having far outgrown its original scope.

-----◇◇◇ from about 15 seconds ◇◇◇ entirely eliminated  
down to **80 milliseconds** ◇◇◇ the **reliance on caching**

2016

**Awarded public tender through innovation partnership**

I designed a bespoke EHS solution lauded by a digital incubator of the French government and was funded for its implementation and continuous development.

-----◇◇◇ used by over **9,000** ◇◇◇ ongoing partnership  
government employees ◇◇◇ of nearly **9 years**

2014

**Built data contextualisation protocol for the Semantic Web**

I jointly designed as well as implemented the procedure and supporting system by which Auckland Museum's collections curator could map out the semantic attributes of their Linked Open Data platform's ever-growing digital archive.

-----◇◇◇ implemented for the **Web 3.0** ◇◇◇ highlighted  
over a decade ago ◇◇◇ by **the W3C**

2012

**Identified and addressed costly, recurring resource waste**

I noticed an opportunity for, designed, built and drove the promotion of a workflow optimisation for technicians at a world-leading aircraft engines manufacturer to substantially reduce the strenuous cost of late-stage testing of our propulsion systems.

-----◇◇◇ over **1,000,000 euros** ◇◇◇ improved longstanding procedure  
saved each year ◇◇◇ in the **defence industry**

First principal engineer role

Migrate to NeovimBegin using Rust  
for personal projectsSwitch to Arch LinuxMigrate Cloud resources  
to ARM architecture

Mastery of Git

Excellent AWS proficiencyJoin UniteMastery of RxJs

Mastery of TypeScript

Mastery of D3.jsMigrate services to IPv6Begin contributing to the TC39

Mastery of AngularJS

Begin freelance activity

Graduation of my apprentice

Excellent JavaScript proficiency

Switch to UbuntuJoin Propellerhead

Excellent Java proficiency

First lead developer role

First mentor role

Skilled C++ proficiency

Join Safran Aircraft EnginesBegin using Debian