# **Alexis Lowe**

#### **Contact Details**

Email: alexis.lowe@chimbosonic.com

Linkedin: linkedin.com/in/alexis-lowe-75426382

Phone: +44 XXX XXX XXXX please contact me via email or LinkedIn to get my phone number

Address: St. Neots, PE19 6BD, UK

# **Objective**

Principal Engineer architecting and building e-commerce solutions for a leading e-commerce company and with experience of maintaining security infrastructure for a leading fin-tech company.

Seeking a new challenge with a focus on taking greater ownership and driving innovation as Principal Engineer and building on my knowledge and experience in Infrastructure Development, Software Engineering and DevOps.

#### **Technical Skills**

CI/CD: Jenkins, Gitlab CI, Github Actions

VCS: Git, Github, Gitlab, SCM

Programming: Typescript, Node.Js, Rust, Bash, Python, C#, Java, C99/ANSI, X86 and MIPS Assembly, Ruby, Powershell, Latex,

ASM, Go, C++

**Infrastructure Automation:** 

Terraform/Terragrunt, Ansible, Troposphere, Packer, Make Web: Next.Js, Apollo GraphQL **E-Commerce:** CommerceTools **System Administration:** Linux

Administration and Server Management, Virtualisation, File Storage management,

Website Hosting

Data Engineering: Data Streaming Cluster Management (Kafka, Zookeeper, SQS) Data collection (Nifi, Rsyslog, Splunk, NxLog) Data analysis (ElasticSearch/OpenSearch, Logstash, Kibana)

Metrics and Dashboards: Datadog,

Grafana, Prometheus

Cloud: AWS, Azure, Digital Ocean Containers: Critical Stack, Kubernetes, Docker, Open Containers, Docker Compose Security: Auth, Vulnerability Scanning and Management (Nessus, RandomStorm, Skybox, Qualys, WhiteHat) SIEM Solutions (Symantec MSS, QRadar, ELK) Windows Administration (SCCM, AD) Web Application Pentesting (BurpSuite,

mitmproxy), Penetration testing, forensics Mobile Application Pentesting, Threat Modelling

Networking: SSH, FTP, iptables, IPsec, OpenVPN, Wireguard, SCP, SMTP, TCP/IP, DNS, DHCP, UDP, NTP, Wireshark

# **Languages - Trilingual**

**English: Native** Spanish: Fluent

French: Fluent Flemish: Basic Knowledge

## **Work Experience**

# May 2022 - present | Principal Engineer - E-Commerce at Moonpig

- Tech Lead for 4 Teams, responsible for their Architecture and Engineering Principles.
  - Coordinated and conducted recurring architecture sessions with the teams to facilitate collaboration and discussion on architectural matters.
  - Architected event-driven systems, designing them to leverage event-driven architecture principles for efficient and scalable operation.
  - Offered technical guidance and support to both senior and junior engineers, providing assistance and expertise to help them overcome technical challenges and achieve their goals.
  - Engaged in collaborative efforts with other principals and their respective teams to ensure consistency and coherence across the entire Tech department.
  - Collaborated with product managers and engineering managers to achieve an ideal technical solution that aligns with the business needs while considering

time limitations and technical restrictions including cost management and cost constraints.

- Partnered with the Director of Engineering to spearhead the technology department's efforts in attaining operational excellence.
- Facilitated and managed a dedicated Working Group at Moonpig, focusing on restructuring product data with the aim of enhancing the efficiency of new product releases on the website.
- Delivered mentorship and guidance to a junior Product Security Engineer, assisting them in their professional growth and development in the field of product security.

## Sep 2021 - May 2022 | Senior Engineer at Moonpig

- Subject matter expert on Terraform and Terragrunt within the Tech department, offering guidance and expertise on these tools.
- Helped lead a significant migration project following the acquisition of Greetz, effectively resolving intricate challenges within a Multi-Tenancy/Multi-instance architecture.
   Moreover, I utilised my language skills to assist with translations and assisted the UK Tech teams in gaining a better understanding of the Dutch customer base.
- Established a standardised framework for deployments and repositories, specifically designed to assist with the migration project.

# Jul 2020 - Sep 2021 | Senior Product Security Engineer at Moonpig

- Developed and implemented the team's processes for vulnerability management.
- Implemented a secrets detection system within the pipeline and established a robust process for efficiently handling leaked secrets.
- Designed and implemented a logging and alerting mechanism for AWS GuardDuty by leveraging Slackbot.
- Established contact points and channels of communication between the Product Security team and the rest of the engineering department.
- Offered engineering support to the Security Operations team during the development of their SIEM (Security Information and Event Management) project.

# Aug 2017 - Jul 2020 | Cyber DevOps Engineer at Capital One

- Lead and subject matter expert on logging infrastructure projects providing reliable logging collection and analysis for diverse technologies.
- Provided thought leadership and tech knowledge on CI/CD pipeline improvement projects.
- Designed, built and maintained fully automated CI/CD pipelines using Jenkins for deployments to AWS serving both cloud and on-premise systems.
- Used modern DevOps tooling such as Ansible, Terraform and Troposphere to automate deployment and configuration of systems at scale with a focus on reproducibility and testability.
- Led the team to greater delivery velocity through process improvements leveraging standard engineering practices and automation using Git, Github and JIRA.
- Worked on automating a number of operation workflows using tools such as Python, Bash and Make.
- Developed dashboards and monitoring capability using Datadog to provide proactive detection of issues and visibility on service usage.
- Used performance testing and metrics to create and fine-tune scalable platforms and maximise cost savings.
- Developed guidelines, provided knowledge and took part in threat modelling sessions for hardening and secure usage of containers.
- Consulted and contributed to the design and architecture of security solutions.
- Capital One Cyber Security Meetup Organiser.

## Jul 2018 - Apr 2019 | Application Security Engineer at Capital One

- Performed API and Web application penetration tests including customer facing banking applications and PSD2 open banking API.
- Automated pentest report creation using Python, shared via Git and Jira.
- Wrote scripts for developers to retest vulnerabilities after applying their fixes.
- Guided developers in secure coding practices.

## Sep 2015 - Sep 2016 | Cyber Defence Analyst at Computacenter

Within the framework of a year's industrial placement from the University of Birmingham worked in the Group Information Assurance division of Computacenter. Worked on ISO27001 compliance, performed infrastructure pentesting, contributed to creation of security operations centre and contributed to the creation of vulnerability management process.

## Jul-Aug 2012 and 2013 | Delivery and Stock Control at Computacenter Belgium

Received a two-week training with the stock manager and then was entrusted with stock management responsibilities. Acquired time management and organisation skills during this period.

#### **Education**

# 2013 - 2017 | BSc in Computer Science with Business Management 2.1, University of Birmingham

### **Computer Science First**

Introduction to Cyber Security Networks and Network Security (C99, IPsec

and iptables)

Operating Systems (C99/ANSI, Linux Kernel) Software Programming (Java and

PostgreSQL)

Team Project (Made a Multiplayer Java

Game)

Information and the Web (XML, JavaScript

and HTML)

Computer Systems and Architecture (X86 &

MIPS Assembly)

Foundation of Computer Science (Ocaml)

Professional Computing Language and Logic Software Engineering

## **Business Management 2.1**

Strategic Management Global Marketing

Introduction to Marketing Human Resource Management Financial Decision Making Supply Chain Management

Financial Analysis

International Economics
Introduction to Economics

Business Organisation and Management

### 2010 - 2013 Collège Dame De Marie, Belgium

Certificat d'enseignement secondaire supérieur (16/20 equivalent to 320 UCAS Tariff Points)

2007 - 2010 Collège Don Bosco, Belgium

2000 - 2007 La Fermette, Belgium

#### **Interests and Activities**

Technology, Open-Source, Programming, Ethical Hacking and Security, Amateur Photography, Cycling, Travelling, Lego, Gaming

# **Other Details**

British national

Lived in Belgium before studying in the UK GitHub: <a href="https://github.com/chimbosonic">https://github.com/chimbosonic</a> CodeBerg: <a href="https://codeberg.org/chimbosonic">https://codeberg.org/chimbosonic</a>

KeyOxide: <a href="https://keyoxide.org/hkp/ac48bc1f029b6188d97e2d807c855db4466df0c6">https://keyoxide.org/hkp/ac48bc1f029b6188d97e2d807c855db4466df0c6</a>

Website: https://chimbosonic.com