

# Maz Nasab

Vancouver, Canada | 604 722 8959

[mazdak.nasab@gmail.com](mailto:mazdak.nasab@gmail.com) | [github.com/mazdakn](https://github.com/mazdakn) | [www.linkedin.com/in/mazdakn/](https://www.linkedin.com/in/mazdakn/)

- **MSc in Computer Science, Networks and Distributed Systems**
- **Over 10 years** of experience designing and developing secure, robust and innovative network systems
- Experienced in **Data Center Networking, Cloud Networking, Network Systems and Services**
- Proficient in **Linux Network Stack, System Development, Network Programming and Automation**
- Advanced knowledge of **open source ecosystem** for building high available infrastructure

## RECENT EXPERIENCE

**Senior Software Engineer** | Tigera, Vancouver, Canada | May 2021 - Present

- Developing and maintaining next generation data plane of Calico CNI using eBPF/XDP
- Designing and developing features using Linux connection tracking, packet filtering and Traffic Control
- Developed a workload runtime security solution by monitoring syscalls and events using eBPF programs
- Introduced stateless firewall capability in Calico BPF data plane by developing XDP programs

**Network Security Architect** | Ericsson, Sweden | 2020 - 2021

- Secured web applications and mobile core networks using firewalls and DoS mitigation systems
- Provided best practices and automation guidelines for hardening Linux and Kubernetes clusters
- Designed and developed an iptables based micro segmentation firewall to save 200KUSD license cost

**Cloud Architect - Network & Virtualization Specialist** | Ericsson, Sweden | 2017 - 2020

- System responsible and designer of data center network for an IoT platform handling 50M IoT devices
- Led 10+ engineers to deploy and operate data center networks and services using VMware NSX
- Improved reliability and performance of low-latency and network-intensive virtual network functions
- Deployed load balancers, firewalls and proxies to satisfy functional and non-functional requirements

**Senior Software Engineer** | Enea Software, Sweden | 2015 - 2017

- Contributed to OPNFV project, a carrier grade flavor of OpenStack for network function virtualization
- Led a team of 3 engineers to design and develop a solution to virtualize customer premises equipments
- Official Linux Foundation trainer for Open Source Virtualization course

**System Developer** | Ericsson, Sweden | 2013 - 2015

- Transformed a TCP/HTTP proxy to a performant and scalable virtual network function on OpenStack
- Automated deployment for zero touch provisioning to reduce the deployment time from days to minutes
- Optimized throughput by tuning host and guest kernel and by bypassing kernel using DPDK

## EDUCATION

**MSc in Computer Science** | Chalmers University of Technology, Sweden | 2013

**BSc in Electrical Engineering** | Iran University of Science and Technology, Iran | 2009

## SKILLS

**Programming & Automation:** C, Go, Rust, Ansible, Python

**Virtualization & SDN Controller:** Qemu/KVM, Docker, OpenStack, Kubernetes, VMware NSX

**Linux Network Stack:** Netfilter/iptables, IPVS, Traffic Control, Socket API, eBPF/XDP