

Parham Alvani

PHD STUDENT · BACKEND DEVELOPER

☎ (+98) 939-09-09-540 | ✉ parham.alvani@gmail.com | 🏠 https://1995parham.me | 📱 1995parham | 🐙 1995parham | 🌐 parham-alvani | 📧 parham.alvani | 📺 1995parham

"I have a dream"



Summary

Current Backend Engineer at ride hailing company Snapp. 3+ years experience specializing in the backend development, system design. Super nerd who loves Vim, Linux and OS X and enjoys to customize all of the development environment. Interested in Network Function Virtualization, Optimization, Software Defined Networking.

PROGRAMMING LANGUAGES AND TECHNOLOGIES

- Golang & C (Expert)
- AMD64 Assembly (Expert)
- Nodejs & Python (Specialist)
- Laravel (Skilled)
- Angular (Specialist)
- Ubuntu, Docker & Kubernetes (Expert)
- Rust (Beginner)

NETWORKING TOOLS AND PROTOCOLS

- OpenFlow1.3, OpenFlow1.5
- ONOS Platform, FloodLight, Ryu
- Mininet

Work Experience

Iranian Telecommunication Research Center (ITRC)

Tehran, Iran

TRAINEE

Summer 2016

- Designed and implemented the home automation solutions using the Raspberry Pi

IoT Working Group of Amirkabir University of Technology

Tehran, Iran

SYSTEM ARCHITECT & SOFTWARE ENGINEER

Jul. 2017 - Jun. 2019

- Designed the scalable IoT Platform that can handle 1K rps with Golang
- Run services with Docker on bare-metals and monitored them using Prometheus

Snapp!

Tehran, Iran

BACKEND ENGINEER

Feb. 2019 - Present

- Developed location based system that handles high load
- Designed and Developed surge pricing system that consumes 6K messages per second with Golang

Honors & Awards

ACADEMIC

- 2016 **4th Place**, Semi-Final National Scientific Olympiad in Computer Engineering
- 2016 **10th Place**, Final National Scientific Olympiad in Computer Engineering

Tehran, Iran

Tehran, Iran

COMPETITION

- Spring 2016 **2nd Place**, 3rd National Digital Design Contest of Iran ASIC League
- Spring 2016 **3rd Place**, 3rd National Digital Design Contest of Iran CoDesign League
- Spring 2015 **3rd Place**, 2nd National Digital Design Contest of Iran CoDesign League
- Fall 2014 **3rd Place**, 14th Amirkabir ACM International Collegiate Programming Contest (ICPC)
- Fall 2014 **Merit Medal**, 39th Asia Regional ACM International Collegiate Programming Contest (ICPC) in Sharif University of Technology

Tehran, Iran

Tehran, Iran

Tehran, Iran

Tehran, Iran

Tehran, Iran

HIGH SCHOOL

| | | |
|------|--|------------------------|
| 2012 | Semi-finalist , National Mathematics and Computer Olympiads | <i>Tehran, Iran</i> |
| 2011 | Finalist , National Mathematics and Computer Olympiads | <i>Tehran, Iran</i> |
| 2010 | Finalist , National Mathematics and Computer Olympiads | <i>Tehran, Iran</i> |
| 2010 | Merit Award , International Mathematics Competition (IMC) | <i>Icheon, S.Korea</i> |

Teaching Experience

Principles of Computer and Programming

TEACHING ASSISTANT

Fall 2014, Fall 2015, Fall 2016, Fall 2017, Fall 2018, Spring 2019, Fall 2019

Amirkabir University of Technology

Under Supervision of Prof. Bakhshi

Advanced Programming

TEACHING ASSISTANT

Spring 2015, Spring 2016, Spring 2018

Amirkabir University of Technology

Under Supervision of Prof. Noorhosseini

Discrete Mathematics

TEACHING ASSISTANT

Spring 2015

Amirkabir University of Technology

Under Supervision of Prof. Fallah

Introduction to Python Programming

INSTRUCTOR

Spring 2015

7th Amirkabir Linux Festival

Principles of Database Design

TEACHING ASSISTANT

Spring 2016, Spring 2017

Amirkabir University of Technology

Under Supervision of Prof. Momtazi

Microprocessor I

TEACHING ASSISTANT

Spring 2016, Spring 2018, Fall 2018, Spring 2019

Amirkabir University of Technology

Under Supervision of Prof.

Homayounpour

Engineering Statistics and Probability

TEACHING ASSISTANT

Spring 2016

Amirkabir University of Technology

Under Supervision of Prof. Amir Haeri

Introduction to Golang Programming

INSTRUCTOR

Spring 2016

8th Amirkabir Linux Festival

IoT & IPv6

SPEAKER

Spring 2016

8th Amirkabir Linux Festival

Principles of Database Design

TEACHING ASSISTANT

Fall 2016

Amirkabir University of Technology

Under Supervision of Prof. Amir Haeri

Data Structure Design

TEACHING ASSISTANT

Fall 2016, Fall 2017

Amirkabir University of Technology

Under Supervision of Prof. Dehghan

Computer Architecture

TEACHING ASSISTANT

Spring 2017

Amirkabir University of Technology

Under Supervision of Prof. Shiri

Introduction to IoT Platform

SPEAKER

Spring 2017

2nd Iran IoT Conference

Golang, The Future of C

SPEAKER

Spring 2017

9th Amirkabir Linux Festival

I1820, The IoT Platform

SPEAKER

Spring 2017

9th Amirkabir Linux Festival

Advanced Python Programming

INSTRUCTOR

Summer 2017

SSC IoT Summer Course

An Introduction to IoT Platforms

INSTRUCTOR

Summer 2017

SSC IoT Summer Course

Computer Networks

TEACHING ASSISTANT

Spring 2018, Fall 2018, Spring 2019

Amirkabir University of Technology

Under Supervision of Prof. Sabaei

Microprocessor Lab

INSTRUCTOR

Spring 2018

Amirkabir University of Technology

Under Supervision of Prof.

Homayounpour

Computer Networks Lab

INSTRUCTOR

Spring 2018, Fall 2018, Spring 2019

Amirkabir University of Technology

Under Supervision of Prof. Sabaei

Advanced Programming Workshop

INSTRUCTOR

Spring 2018

Amirkabir University of Technology

Under Supervision of Prof. Noorhosseini

Operating System Lab

INSTRUCTOR

Fall 2018, Fall 2019

Amirkabir University of Technology

Under Supervision of Prof. Zarandi

Introduction to Programming Workshop

INSTRUCTOR

Fall 2019

Amirkabir University of Technology

Under Supervision of Prof. Bakhshi

Research Experience

SFC Requests Admission Control by Considering VNFMs

MAXIMIZE PROFIT BASED ON AN OPTIMIZATION PROBLEM FOR ACCEPTING SFCs AND CONSIDERS VNFMs FOR THEM

- M.Sc. Project

Prof.Bakhshi

Fall 2019

General purpose IoT platform, design for scalability

RESEARCH AND DEVELOP DISTRIBUTED, DOCKER BASED IoT PLATFORM NAMED I1820

- B.Sc. Project

Prof.Sabaei

Fall 2017

Department-wide platform for IoT and building management systems

RESEARCH ON DIFFERENT OPERATING SYSTEMS, FRAMEWORKS AND PROTOCOL STACKS IN IoT

- Amirkabir IoT Laboratory (AoLab) resource are available here

Prof.Bakhshi

2015–2017

Resource Provisioning in Software Defined Networking

- This research was done for Research Method and Technical Writings course

Prof.Shiri

Spring 2016

Education

Energy Atomic High School

DIPLOMA OF MATH & PHYSICS

- GPA: 19.45/20

Tehran, Iran

Sep. 2009 — Sep. 2013

Amirkabir University of Technology

B.Sc. IN COMPUTER SOFTWARE ENGINEERING

- GPA: 18.94/20

Tehran, Iran

Sep. 2013 — Sep. 2017

Amirkabir University of Technology

M.SC. IN COMPUTER NETWORK

- GPA: 18.94/20

Tehran, Iran

Sep. 2017 — Sep. 2019

Amirkabir University of Technology

PH.D. IN COMPUTER NETWORK

- GPA: N/A

Tehran, Iran

Sep. 2019 — Sep. 2023

Extracurricular Activity

Linux Festival

SCIENTIFIC DIRECTOR

- Selected the presentors for event
- Coordinated the technical aspects of event

Tehran, Iran

Spring 2016, Spring 2017

AUT ICPC

HEAD OF TECHNICAL TEAM

- Setup the judge server
- Coordinated the clients configuration and setup

Tehran, Iran

Fall 2016, Fall 2017, Fall 2018

Amirkabir Programming League

HEAD OF TECHNICAL TEAM

- Setup the judge server
- Coordinated the clients configuration and setup

Tehran, Iran

Spring 2019

Certificate

- CompTIA Network+
- Supporting Windows 8.1 (70–688)
- Installing and Configuring Windows Server 2012 (70–410)
- Administering Windows Server 2012 (70–411)
- Configuring Advanced Windows Server 2012 Services (70–412)
- Designing and Implementing a Server Infrastructure (70–413)
- Implementing an Advanced Server Infrastructure (70–414)
- LPIC-1 (101–102)
- LPIC-2 (201–202)
- Cisco CCENT
- VMware vSphere: Install, Configure, Manage
- VMware vSphere: Optimize and Scale