# Kutluhan Buyukburc

Singapore kbuyukburc@gmail.com

## **Skills and Programming Languages**

Advanced C/C+

Python

Embedded Systems Embedded Linux PCB Design

OpenCV Org. Computer Vision Certificates of Excellence
- DEEP LEARNING WITH PYTORCH, 98/100
- COMPUTER VISION II: APPLICATIONS, 97/100

COMPUTER VISION I, 97/100

Intermediate SQL

Shell Script Android Studio Google Cloud

**AWS** 

AWS Lambda Foundations Certificate

Basic HTML & CCS

Java Script Solid Works Adobe Photoshop

#### **Work Experience**

**Firmware Lead** 2018 - 2020

Lemnis Technologies, Singapore

- Headed the firmware team and led the development of firmware for VR headsets, piezo and electric motors actuation controllers, eye tracking systems and liquid lenses
- Designed multilayer and EM protected PCB schematics
- USB 2.0-3.1 electronic and firmware developed.
- Researched data and co-wrote papers and patents.
- Received Innovation Award for the praised Verifocal VR Kit.
- Participated in SIGGRAPH 2019 and 2020

#### **Electronic Card Designer**

2017

Gymsoft, Izmir, Turkey

- Developed code to control turnstile in gyms using Python and Raspberry Pi GPIO
- Programme is implemented in gyms in Turkey and exported to some African and European countries

Intern 2016

Schneider Electric, Izmir, Turkey

- Built circuit breakers from scratch for iron-steel factories
- Learnt to read and write industrial schematics and the testing of industrial products

Software Developer 2016

Gymsoft, Izmir, Turkey

- Developed Linux programme to control turnstiles on the Raspberry Pi

- More than 50 sport centres in Turkey benefitted from this software

### Intern (Software Developer/Electronic Card Designing)

2013 - 2015

Mekatel Electronic, Izmir, Turkey

- Developed Windows programme to control water tank levels on the internet
- Programme is used in villages in Izmir
- Designed electronic cards to control static of cards in petrol stations

#### Education

## Bachelor's Degree in Electronics and Electrical Engineering

2013 - 2017

Manisa Celal Bayar University, Izmir, Turkey

# Anatolian Technical High School Diploma in Industrial Automation Technologies / Mechatronics

2009 - 2013

Mazhar Zorlu Technical and Industry Vocational High School

#### **Patents and Publications**

Ravindranath, Pradeep Anand, Kutluhan Buyukburc, and Ali Hasnain. "Self-calibration of sensors using point cloud feature extraction." In *SPIE Future Sensing Technologies*, vol. 11525, p. 115250M. International Society for Optics and Photonics, 2020.

Hasnain, Ali, Pierre-Yves Laffont, Shukri Bin Abdul Jalil, Kutluhan Buyukburc, Pierre-Yves Guillemet, Samuel Wirajaya, Liqiang Khoo, Teng Deng, and Jean-Charles Bazin. "Piezo-actuated varifocal head-mounted displays for virtual and augmented reality." In *Advances in Display Technologies IX*, vol. 10942, p. 1094207. International Society for Optics and Photonics, 2019.