

## Muhammad Sohaib Ashraf

**Software Engineer** 

Software Engineer with several years of experience. Master in Artificial Intelligence and Robotics, as well as a bachelor's degree in Software Engineering. Ambitious to prove my worth in the development of advanced robotic technologies. Experienced in developing scripts using ROS, Isaac SDK, Python, C++, AI, and ML algorithms. Additionally, I am a competent developer with expertise in Unity 3D, C#, MATLAB, R, and PHP.





+447517646682



Indonesia



## **WORK EXPERIENCE**

## **Software Engineer** Cube Discipline

03/2022 - Present

Pakistan (Hybrid)

- Achievements/Tasks
- Working on some applications to introduce Artificial Intelligence.
- Developing AI based job hunting algorithm.
- Developing customized user experience.

# Robotic Software Engineer Epazz, Inc

03/2021 - 03/2022

Pakistan (On-Site)

Pakistan (Hybrid)

Achievements/Tasks

- Defining software requirements and carried out design procedures from scratch.
- Working on a project with the primary goal of enabling robots to learn how to cook.
- Working on multiple robotics and IoT projects using technologies.

## Software Engineer

**Tricasol** 

06/2020 - 03/2021

Achievements/Tasks

- Worked with them to improve their pricing module using AI.
- Developed Personalized recommendation system.
- Implement data protection strategies.

# **Software Engineer (Robotics)** Oneberry Technologies

12/2019 - 05/2020

Singapore (On-site)

Achievements/Tasks

- Adapted three existing robotics projects to improve performance and add various new features.
- Semantic segmentation was used to enable the robot to navigate autonomously along a sidewalk with the additional capability of obstacle avoidance using RGB cameras.
- Worked on robotics vision and autonomous movement.

#### **Software Developer** Cube Discipline

03/2017 - 12/2017

Pakistan (On-Site)

Achievements/Tasks

- worked as a member of the web development team in the last semester of my Bachelor's degree and continue as fulltime after completion of the semester.
- Successfully completed and deployed many web-based business apps.
- Supervised a development team.





## **EDUCATION**

## MSc AI with Robotics University of Hertfordshire

2018 - 2019 Awarded with Distinction - Hatfield, United Kingdom

# **BS Sofware Engineering**University of Management and Technology

2013 - 2017 Awarded with CGPA 2.81 - Lahore, Pakistan



## **SOFT SKILLS**

Team Work

Communication

Research

Time Managemen

Report Writing

**Problem Solving** 

Critical Thinking

Creativity

Adaptability

Self Learning



## **TECH SKILLS**

#### Robotics

ROS1, ROS2, Isaac SDK, OpenCV, TensorFlow, Control System, Sensor Integration, SLAM, Gazebo, Path Planning

#### AI and Machine Learning

Data Analysis, Python, TensorFlow, Deep Learning, Reinforcement Learning, Keras, PyTorch, Scikit, Yolo, QT

Game Development Unity3d, 3D Modelling

#### **Web Development**

Laravel, Codelgniter, jQuery, Bootstrap

#### **Software Languages**

C, C++, C#, Python, Java, JavaScript, PHP, HTML, CSS, R, MATLAB, SQL, git, Lisp



## **PERSONAL PROJECTS**

#### Arena ROSNav with NAV2 (07/2023 - 08/2023)

 Developed ROS1 and ROS2 packages that use ros nav2 using simple commander and using ROSBridge, it was integrated with Arena Rosnav, which is a modular ROS package for training and evaluating navigational algorithms of robots.

#### Robotic Chef (03/2021 - 03/2022)

 Worked on developing a Robotic arm that help mimic the movement of a chef to cook a cousin with an optimal setting.

#### KenOB2 (02/2020 - 05/2020)

KenOB is a security Robot developed by Oneberry Technologies, Singapore. It patrols around the
facilities to observe the movements and helps security department to get a better view of the
facilities. Upgraded KenOB to kenOB2 by Integrating it some security features using Computer
vision and Its movement with 3d SLAM.

#### Sidewalk Robot (12/2019 - 02/2019)

 Worked on a Robot that can travel on a sidewalk with simple camera installed. Semantic Segmentation and some Computer vision algorithm were used.

#### Evolutionary Flocking Shooter Robots (02/2019 - 06/2019)

Developed a Robotic Simulation that help a flock of robot to learn discovering and finding the
optimal secured path to a destination by avoiding the threats and eliminating them.

#### Private Note (09/2018 - 01/2019)

Developed an Android application that help user to save their notes in a encrypted and secure way
on a cloud and retrieve in a simpler way while they can also download a password protected pdf of
their note.

#### EselloApp (03/2017 - 07/2027)

 Developed a Web Application that manage the overall operation of a ware house from Inventory management to delivery.

#### Cheffu (05/2016 - 02/2020)

 Developed a web and mobile application that help cooking student to find a Cheff, whereas the Cheff can also get clients that pay to cook for them.

#### Snake and Cake (09/2016 - 11/2016)

• Developed a game using OpenGL and C++ which is a replica of classic game "Snake Xensia"

## **OTHER EXPERIENCE**

## **Robotics Lecturer**

The Millennium Universal College

02/2023 - 05/2023

Lahore, Pakistan

#### **Door Supervisor** SM Facilities

07/2019 - 10/2019

Peterborough, United Kingdom

# **Private Equity Intern**Graphite Capital

06/2019 - 06/2019

London, United Kingdom

## **Support Assistant** Match Options

08/2018 - 12/2018

St Alban, United Kingdom

# Math Tutor Illum Institute

03/2018 - 05/2018

Hemel Hempstead, United Kingdom



## TOOLS

PyCharm
Adobe Photoshop

Maya

Microsoft Office

Android Studio

**PHPStorm** 

Xampp

Gazebo

Unity3d



## **LANGUAGES**

English

**Full Professional Proficiency** 

Urdı

Native Speaker

Bahasa Indonesia

Beginner



## **INTERESTS**

Gaming Gaming

Coding

Bedminton

Cricket

Travelling

Tech News

Robotics