MAMONA FIAZ

Mechatronics&Control Engineer

Phone: +92-310-4609358

Email:mamonafiaz.981@gmail.com

Address: street no. 2, Beadon Road mall road, Lahore

OBJECTIVE:

To pursue a highly rewarding career, seeking for a job in challenging and healthy work environment where I can utilize my knowledge for industrial growth.

ACADEMICS:

Ms. Mechatronics&Control Engineering: University of Engineering & Technology, Lahore	Continue	2018-2020
B.Sc. Mechatronics&Control Engineering: University of Engineering & Technology, Lahore	CGPA 3.26/4.0	2014-2018
F.Sc. Pre-Engineering: Punjab College, Lahore(Lahore board)	Percentage 89%	2011-2014
Matriculation: Fatima Girls High School, Lahore (Lahore Board)	Percentage 91%	2009-2011

PROFESSIONAL EXPERIENCE:

Packages Limited

2.5 months Internship, 2018

Internship include designing technical manuals of printing machines (Lemanic 82 and Rivera) in Business unit folding carton section. Documentation related electrical ,mechanical and electronics knowledge related to machines was prepared .

PROJECTS:

1 -Ms Research Project: Research on attitude control systems of satellite (continue....)

<u>2- FINAL YEAR Bs.PROJECT</u>: Modeling and control of quadcopter with indoor Simultaneous Localization and Mapping (SLAM).

- ✓ **Final Year Project Brief:** Mathematical Modeling of Quadcopter, Design of PID controller in 6 DOF for stabilizing and linear control with dynamic equations, implementation of Kalman filter for state estimating and filtering
- ✓ **Simulation:** Linear control at 6 DOF ,trajectory control of Quadcopter, Quadcopter navigation in unknown environment (simulation environment was designed in MATLAB)
- ✓ Hardware: Real hardware was developed by implementing PID controller using Arduino in 3DOF
- ✓ **SLAM**: 2D SLAM with Rplidar with help of hector SLAM package in ROS (Linux)
- **✓ SEMESTER PROJECTS:**
- ✓ Designing of redundant robot manipulator for 3d working (robotics)
- Railway crack detection system (Instrumentation and Measurement)
- ✓ Daily production and labor efficiency record system using PLC (Industrial Automation)
- √ Fan speed control system using Arduino (Embedded System)
- ✓ Speech recognition system (Digital Signal Processing)
- ✓ Soft wheel robot (Robotics)
- ✓ Digital Clock using ICs (Digital Logic Design)
- ✓ Modeling and control of inverted pendulum (Control System)
- ✓ Designing of Fork lifter machine in solid works (Solid Works)

Research Interests Areas:

Modeling and simulation, Control systems, Arial machines(Drones), Artificial Intelligence, Embedded system, Computer vision, Robotics

CO-CURRICULAR ACTIVITIES:

✓ Member of Mechatronics Club at Uet Lahore.

COMPUTER PROFICIENCY:

- ✓ AutoCAD, Solid Works, ISIS Proteus, ARIES, artificial intelligence, computer vision
- ✓ MATLAB, C++ (Code Block), Arduino Board, Mplab, Rasberry pi ,Linux
- ✓ MS Office (Word, Excel, PowerPoint)

KEY SKILLS AND ABILITIES:

- ✓ Develops strong and innovative solutions to complex problems by identifying the root causes of issues and takes personal responsibility for making decisions and following these through.
- ✓ Displays exceptional interpersonal skills through the ability to gain the trust and respect of others.
- ✓ Ability to work in global environment and focus quality and result orientation.
- Adapts and promotes change easily but will change decisions where immediate benefit is not apparent.

INTERESTS:

Research, Hands on experience for Technical work, Designing of Systems, control system Projects