VIRAJ KULKARNI

+91-8830534746 | viraj.kulkarni2003@gmail.com | LinkedIn |

EDUCATION

Savitribai Phule Pune University **CGPA : 8.25/10**
Bachelor of Engineering in Electronics and Telecommunications *January 2021 – May 2025*

Sawkar Science College Satara **Percentage : 93.33%**
HSC *August 2019 – July 2021*

TECHNICAL SKILLS

Languages and Databases: Java, Python, C/C++, MATLAB, MySql, Blynk.
Software: Eclipse, MATLAB, VS Code, Proteus, MS Office.
Other: Data Structures and Algorithms, Object Oriented Programming, Database Management Systems, Data-Signal Processing and Analysis, CNC Programming and Operation, Computer networking, Embedded Programming and IoT.

Internship EXPERIENCE

Pantech ProEd Pvt Ltd Jan. 2024 – March 2024
Embedded Systems & IoT Engineer Intern

- Developed IoT based solutions in an innovative manner and programmed microcontrollers, contributing to a **15% increase in system efficiency**, **30% reduction in power consumption**.
- Implemented IoT protocols and collaborated on hardware-software integration projects, resulting in a **20% reduction in development time.**
- Improved **system performance by 25%** and **reduced tolerances by 15%** through effective sensor interfacing and optimization using **server-system integration**.

Radiant Engineering Dec. 2023 – Jan. 2024
Automation Engineer Intern

- Applied CNC automation skills for an industrial project, achieving precision fine boring on cylinder liners with a **precision of 66.10 mm ±0.005 mm**, critical for **achieving 99% accuracy** in automotive sector applications.
- Developed proficiency in **CNC programming** and operation, setting **spindle speeds up to 1600 RPM** and optimizing machining processes, resulting in a **95% improvement in precision and efficiency.**
- Resolved independently **95% of operational issues**, **reducing scrap rates by 20%** and boosting manufacturing efficiency, resulting in a **15% improvement in client satisfaction scores**.

AICTE NEAT-Mathworks May 2023 – Sept 2023
MATLAB developer Intern

- Developed mathematical & AI based projects using **MATLAB**, focused on data visualization & data analysis by **90% error reduction**.
- Analyzed and processed datasets with **over 100,000 entries** to extract meaningful insights.
- Created comprehensive data visualizations, enhancing **data interpretability by 30% & accuracy by 25% .**

PROJECTS

Smart HealthCare System | *Embedded Software Programming & Interfacing, IoT Protocols, PCB Design & Assembly*

- Developed & **implemented a real-time healthcare system** that achieved data transmission and display **latency of less than 1 second**, providing accurate and timely health metrics.
- **Optimized the system's power consumption by 30%,** ensuring continuous operation without any interruption.
- **Conducted user testing**, reporting a **96% accuracy & 40% more cost-efficiency** for ease of use and data reliability.

Automotive Precision Fine Boring on Cylinder Liners | *CNC Programming and Operation, Quality Management.*

- Achieved a **bore diameter of 66.10 mm with ±0.005 mm precision**, meeting automotive standards.
- Led a team to optimize CNC processes, **increasing efficiency by 35% , increasing accuracy by 99% and reducing scrap rates by 20%.**
- Successfully met all specifications, **earning a 15% increase** in client satisfaction and industry recognition. .