Company Name: TARDID Technologies Pvt Ltd

Profile:

Robotics Engineer Intern

Eligibility:

Engineering Masters (MTech/MCA)- **(Robotics/Embedded/CSE/EEE/IT -Unplaced students only**)

Academic Qualification: MTech (2026 passing out)

About the company:

TARDID built Brainbox, is an industry specific **Artificial Intelligence driven Enterprise Asset Management Platform** for Shipping, Aviation, Railways, Wind Farms, Oil & Gas (upstream, midstream), original equipment manufacturers and government.

Job Responsibility: Robotics Engineer Intern

Role Expectations:

- Design, develop, and implement algorithms for autonomous navigation, motion control, and path planning for USVs and UUVs.
- Strong proficiency in Linux & Robotic Operating System (ROS2) platform, demonstrating the ability to develop, implement and maintain ROS2-based software architecture for autonomous systems.
- Develop software for real-time processing of sensor data, including sonar, radar, cameras, GPS and other sensors.
- Develop AI-based decision-making systems for autonomous maritime operations.
- Build and customize simulation environments using Gazebo, Unity, Moveit2, MATLAB/Simulink and other tools for testing and validating autonomous algorithms.
- Design 3D models for custom simulation scenarios using Blender, FreeCAD, SolidWorks, or similar tools.
- Collaborate with cross-functional teams to ensure proper integration of software with physical systems.
- Experience in implementing robust communications for autonomous vehicles for reliable data transmission with limited bandwidth and high latency.
- Test and validate the performance of autonomous vehicles in simulations and in real-world conditions, adjusting algorithms as needed.
- Adhere to established coding guidelines or standards and maintain clear, organized

documentation for all work performed.

- Stay up to date with the latest research and advancements in maritime robotics & autonomy and apply new techniques to improve system performance.

Preferred:

- Knowledge of machine learning and AI techniques for autonomous systems
- Experience with simulation tools (Gazebo, MATLAB/Simulink, or similar)
- Understanding of maritime environments and associated challenges
- Experience with control systems theory and embedded systems
- Familiarity with C# or MATLAB