IJARSCT
ISSN (Online) 2581-9429
International Journal of Advanced Research in Science, Communication and Technology (IJARSCT)
International Open-Access, Double-Blind, Peer-Reviewed, Refereed, Multidisciplinary Online Journal
Impact Factor: 7.67
Volume 5, Issue 5, March 2025

Alcohol Sensor Engine Lock System Using Arduino

Samarth Kulkarni, Pratik Borse, Pranav Patil, Piyush Lone, Prof. R. S. Taday
Department of Electronic and Telecommunication
Guru Gobind Singh Polytechnic, Nashik, India

Abstract: *The Alcohol Sensor Engine Lock System using Arduino is an advanced safety mechanism designed to mitigate accidents caused by drunk driving. This paper presents a comprehensive study of a prototype system that integrates an MQ-3 alcohol sensor, Arduino microcontroller, and an engine-locking mechanism. The system operates by analyzing the driver's breath for alcohol concentration levels. When the alcohol level exceeds a predefined threshold, the Arduino microcontroller processes the sensor data and activates a relay to disable the vehicle's ignition system, effectively locking the engine.*

Keywords: Alcohol Detection , Engine Lock System , MQ3 Sensor

DOI: 10.48175/IJARSCT-24184