Design and Implementation Of Advanced Safety Operations In Car Using Controller Area Network (CAN) Protocol

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Abstract: Controller Area Network (CAN) bus is a vehicle bus standard which is designed to allow the microcontrollers and devices to communicate with each other within a vehicle without a host computer. This paper explains how to implement CAN protocol for vehicle monitoring and control systems. The main feature of the system includes monitoring of different parameters such as CO level, automatic wiping system etc. MQ 6 sensor is used to detect the CO level inside the car, PIR sensor is used to detect the presence of human inside the car and humidity sensor is used to sense the humidity level and thereby control the wiper system. Thus, advanced safety operations in car can be implemented using CAN protocol.