

AUTOMATIC BEAM CONTROLLER

Brief Business Problem:

During night time while driving in single lane roads, every driver faces problem of opposite vehicle's high beam.



Proposed Solution:

➤ That problem can be solved using Ultrasonic Sensor and Light Dependent Resistor, when any vehicle in opposite direction is detected, automatically the high beam will be converted to low beam.



➤ Beam remains low until the vehicle is in line of sight with the sensor.



- Again when the vehicle is out of sight with the sensor, high beam turns automatically.
- In this way the problem of high beam can be controlled in single lane roads.



Proposed tech stack : Ultrasonic Sensor is used to detect any object(vehicle) coming in opposite direction, and Light Dependent Resistor is used to detect the light of opposite vehicle. When both object and light are detected our vehicles high beam turns low and the circuit is implemented using Arduino Uno.

Market place : This solution will reduce many accidents caused because of using high beam lights in single lane roads during nights.

Effort (Hours) and Cost (INR) of Implementation :

Effort: Person hours-3persons * (8 hours 0 days 0 weeks) = 24 hours, Cost: Hardware:- 3000 - 4000 INR.

Theme Alignment : Internet of things.

Industry Alignment : Vehicle automation (Government and Public Services).