

Design and Fabrication of Steering Gear Mechanism with Movable Headlights using Embedded Systems

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Abstract: *The main aim of any design must not solely be targeted on customer satisfaction however conjointly customer safety following this the amount of accidents are witness solely because of poor lighting facilities provided in automobiles on curved road static headlights are insufficient since they point tangential it along any point of curve instead of pointing in the vehicles direction so to avoid this problem steering controlled headlamp system has been projected which might hopefully flip out to be a boon to the individual driving through the sinusoidal roads throughout night times. Special safety features are built into cars for years some for the security of car's occupants only, and some for the security of others. One among the alternatives available in design and fabrication of steering controlled headlight system. car safety is important to avoid automobile accidents or to minimise the harmful effect of accidents, especially as concerning human life and health. automobiles are controlled by incorporating steering controlled headlight mechanism. The Ackerman steering mechanism helps the motive force to guide the moving vehicles calls on the road by turning it right or left consistent with his needs thus a combination of the steering system and embedded system link kills the headlights within the direction as per the rotation of the steering wheel. this mechanism has been incorporated in BMW, Audi Q-7 and Benz etc., to make sure a safer drive, but our main aim is to implement the system in all vehicles at lower cost.*

Keywords: Steering Gear Mechanism

REFERENCES

- [1]. Saravana Kumar., et., al., "Design and Fabrication Of Head Light Alignment With Steering System", "International Journal of Pure and Applied Mathematics" Volume 116 No. 19 2017, 547-550, ISSN: 1314-3395.
- [2]. Tushar Wagh., "Design And Development Of Electric Vehicle With Movable Headlight", "International Research Journal of Modernization in Engineering Technology and Science" Volume:02/Issue:10/ October -2020, e-ISSN: 2582-5208.
- [3]. Dr. Ashok Sutagundar., et., al., "Automated Headlight System Using Embedded Computing System", "Indian Journal of Scientific and Research" Volume 17 Issue 2 2018.
- [4]. K. Manohar Reddy and U. Mahaboob Basha (2015). Experimental Setup of Steering Controlled Headlight Mechanism. J. of Advancement in Engineering and Technology. V3I2. DOI: 10.15297/JAET.V3I2.
- [5]. G Ravi Kumar., et., al., "Advanced Head-Light Controlling System for Automobile", "International Research Journal of Engineering and Technology", Volume: 03 Issue: 10 Oct -2016, e-ISSN: 2395 - 0056. Manisha V Makwana., et., al., "Design and Manufacture of Movable Headlight System in Automobile", "International Journal of Innovative and Emerging Research in Engineering" Volume 1, Issue 2, 2014, e-ISSN: 2394 -3343