

VISVESVARAYA TECHNOLOGICAL UNIVERSITY  
 "JNANA SANGAMA", BELGAVI-590018 KARNATAKA



Mini Project Report (18ECMP68)

ON

**"AUTOMATIC STREET LIGHT CONTROLLER"**

Submitted in partial fulfillment of the requirement for the award of degree

**BACHELOR OF ENGINEERING**

IN

**ELECTRONICS & COMMUNICATION ENGINEERING**

**Submitted by:**

**CRISPINA VIOLET.P (USN: 1SV19EC008)**

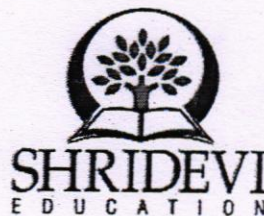
**SHARANA KUMAR (USN: 1SV19EC028)**

**Under the Guidance of:**

**Prof. Yogeesh M B.E., M.Tech**

**Assistant Professor, Dept of ECE.,SIET**

Tumkuru



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**HOD**  
**Dept of E&C**  
**SIET, Tumkur-6**

**DEPARTMENT OF ELECTRONICS & COMMUNICATION ENGINEERING**

**SHRIDEVI INSTITUTE OF ENGINEERING AND TECHNOLOGY**

(Recognized by govt. of Karnataka, Affiliated to VTU, Belagavi and approved by AICTE, New Delhi)

**Sira Road, Tumkur-572106**

**2021-2022**

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**PRINCIPAL**  
**SIET., TUMAKURU.**

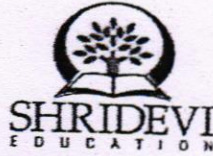


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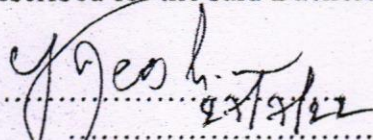
2021-2022

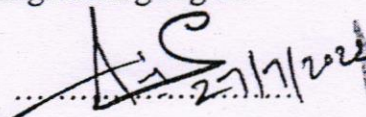



DEPARTMENT OF ELECTRONICS & COMMUNICATION ENGINEERING

## Certificate

This is to Certified that the mini project work (18ECMP68) entitled "AUTOMATIC STREET LIGHT CONTROLLER" has been Successfully carried out by CRISPINA VIOLET.P(USN: 1SV19EC008) ,SHARANA KUMAR(USN: 1SV19EC028), a bonafide students of Shridevi Institute of Engineering and Technology, Tumkur- 572106, in partial fulfillment for the award of Bachelor Of Engineering in Electronics & Communication Engineering of the Vishvesvaraya Technological University, Jnana Sangama, Belagavi - 590018, during the academic year 2021-2022. It is certified that all corrections/suggestions indicated for internal assessments have been incorporated in the report. The mini project report has been approved as it satisfies the academic requirement with respect to the mini project work prescribed for the said Bachelor Of Engineering degree.

  
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Signature of the guide  
principal

  
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Signature of the HOD

  
.....  
Signature of the

Prof. Yogeesh M  
Assistant professor  
Dept. of ECE., SIET  
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Prof. Aijaz Ahamed Sharief  
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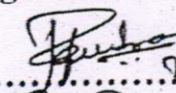

Dr. Narendra Viswanath  
Principal  
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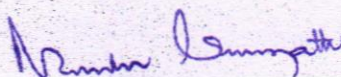
### EXTERNAL VIVA

Name of examiners:

- 1...Raghavendra..D
- 2...Dr. Pradeep..K.G.M

Signature with date:

  
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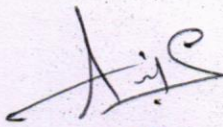


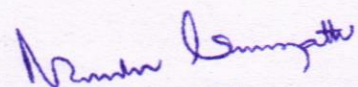
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## ABSTRACT

We present an Arduino-based automation system to control the streetlights based on vehicles and object's detection. We aim to design various systems to achieve the desired operations, which no longer require time-consuming manual switching of the streetlights. The proposed work is accomplished by using an Arduino microcontroller, a relay and infrared -sensors . Firstly, we show that the streetlights can be controlled based on the night and object's detection. In which the streetlights automatically turn to DIM state at night-time and turn to HIGH state on object's detection, while during day-time the streetlights will remain OFF. Secondly, the proposed automated system is further extended to skip the DIM condition at night time, and streetlights turn ON based on the objects' detection only. The proposed systems are designed at lab-scale prototype to experimentally validate the efficiency, reliability, and low-cost of the systems. We remark that the proposed systems can be easily tested and implemented under real conditions at large-scale in the near future, that will be useful in the future applications for automation systems and smart homes

  
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