

Optimasi Lampu Penyeberangan Zebra Cross Dengan Metode Webster

Optimization of Zebra Cross Crossing Lights With the Webster Method

Sofyan Arif Af Rizal

Study Program of Informatics Engineering

Majoring of information Technology

Program Studi Teknik Informatika

Jurusan Teknologi Informasi

ABSTRACT

The design of this touchless zebra crossing is designed for pedestrians to cross safely, anticipate the spread of the covid-19 virus and make it easier for drivers and pedestrians to use the Zebra Cross. Arduino Uno is a microcontroller board based on ATmega328 (datasheet). The method used for Arduino Uno in designing Crosswalk Lights is the Webster method. Infrared Proximity Sensor, also known as proximity sensor, proximity sensor is an electronic sensor that can detect the presence of nearby objects without physical contact. It can also be said that the proximity sensor is a device that can convert information about the movement or presence of an object into an electrical signal. Webster's method is used to minimize delay in the form of the optimum cycle time equation to calculate the flash time of the crosswalk lights based on the current density of vehicles and the width of the road. This study evaluates the Optimization of Zebra Cross Crossing Lights with the Webster Method. With this technology, it is expected to optimize the function of the Zebra Cross to provide safety for pedestrians in crossing the Zebra Cross road.

Keywords: Crossing Light, Arduino Uno, Webster Method, Infrared Sensor