

ABSTRACT

Highway accidents involving both cars and motorcycles are identified as common issue nowadays. Those are caused by reckless drivers who drive carelessly and irresponsibly. Driving with high speed is a trigger for an accident to happen. Therefore, speed limitation is a must to avoid accident. In this final project, a system called moving object speed detector is going to be made. The system is going to be applied to a moving motorcycle by using the comparison between pixel and distance. The ability to detect this moving object is called motion detection system. Motion detection system is a system which is able to detect motion in a video. The experiment done on this paper is by concerning about how many frames and threshold are taken as well as the distance of object are used. Values would be taken from the experiment for then are going to be used for further experiment. Meanwhile, the device that is used to detect speed is a camera. The simulation of the system is available to detect the speed of moving object during the day with average error value of 11%. when this system was simulated on moving motorcycle, it could detect the object up to 13 meters far.

Keywords: Speed, Motion Detection, Pixel, Distance