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Implementation of Real Time Distracted Driver Detection using Artificial Intelligence

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Abstract: Around the world, there has been a lot of worry about traffic fatalities. There is seldom a day when there isn't some news about traffic fatalities. nThe major reasons for the sharp increase in the number of traffic accidents are thought to be changing environmental circumstances and the failure of traffic sign recognition systems to materialise. As the world moves closer to a day when driverless or autonomous vehicles will be the norm, this research suggests a cutting-edge method to assist motorists in driving safely by focusing primarily on a technique for detecting traffic signs on the road The suggested system is a component of the Intelligent Transport System (ITS), which may one day become a Smart City dimension. The work done here mostly focuses on the difficulties that could be overcome to prevent traffic accidents by implementing a device that can help drivers with low vision see traffic signs while driving precedence to business signals. We fail to see business signs for a variety of reasons, including difficulty fastening, fatigue, and sleep deprivation.

Keywords: The work-done describes the usage of Binarization and Region Of Interest to preprocess pictures for traffic sign detection and recognition using Convolution Neural Network(CNN) classification model using built-in OpenCV functionalities (ROI).

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376