

## INFORMATICS INSTITUTE OF TECHNOLOGY

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# Vehicle Parking Violation Detection System

A dissertation by

Sahan Wickramaratne

Student No: 2015073

Supervised by Ms. Chathura Sooriyaarachchi

Signature of Student	Signature of Supervisor

#### **Abstract**

Since the number of road accidents are growing exponentially in the recent past, safety and comfort for Sri Lankan road users is becoming a matter of grave concern. Seems to be that, illegal vehicle parking has much greater impact in this crisis. Most of the time drivers tend to park in a road ways if there is no police officer is present. So that the road traffic will also get increase. To address this issue following system has introduced some image processing algorithms to detect the parking violations in real time. The main objective of this system was to build a safer and much more reliable system against parking violations. In order to reduce unauthorized parkings, the system capture the vehicle if it's parking in a no parking area or parking in an unethical manner. System also track the number plate of the vehicle by using the number plate recognition algorithm. The owner of the vehicle is identified by using the number plate and the system automatically incur penalty to the violator for breaking the parking rules. The penalties charged to the violator in any case of parking violations. Moreover, the details of the vehicle is transmitted to the police head quarter's parking violation section and the details of the vehicle and details of the owner of the vehicle are displayed in the system whenever the vehicle violates the Parking rule. Easy cash payment method used for the payment of penalties.

Keywords: Image processing; Parking violations