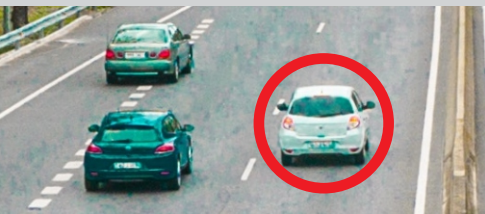




DETAILS	
VEHICLE NO	ABC 1234
SPEED LIMIT	120 KMPH
AVERAGE SPEED	128 KMPH
INSTANT SPEED	132 KMPH



Instant Speed Enforcement System (ISES)

Speed Enforcement system detects the speed of passing vehicle with License Number Plate on the target location and compare its speed with allowed speed by authorities at that location if found over speed then VMS display specific Number Plate with speed to commuter to make him slow down.

Methodology

System detect the speed of each vehicles by using radar sensor technology and capture license plates of each vehicles by camera & OCR technology on the targeted location. The radar unit which identifies the speed of each vehicle that passes in front of the system and at same time ANPR application capture the number plate and image of the each vehicle passing from that location. The application software sends vehicle number plate and speed data to VMS and display on it at this Pattern "ABC-100 Your Speed

130KM/H". The system management control software gathers all of the data provided by the radar & ANPR application and stores the information i.e vehicle numbers plate and speeds of each vehicle into central database. From this information the Central Web software enables the generation of reports which identify vehicle's numbers plates and its speed with image that have exceeded the speed limit at various spots.

System Components

- **Radar Speed Sensor**
- Radar uses radio waves to detect presence, direction, distance, and speed
- **Variable Message Sign(VMS)**
- **Camera** – Digital cameras are used in the image acquisition
- **ANPR Software** – This software has the OCR capabilities, which results in the extraction of the number plate from the digital image.

Software Management Control System

- **Local Database** – This provides storage for the data (number plates that have been read by the ANPR).
- **Back End Software** – The back end software is located on a server and provides desired reports.
- **Power**
- **Communications**

System Features

- A high rate of speed measurement.
- Capable of recognitions at high speed.
- Covers 4 lanes, speed range 20 to 250 km/h.
- Pre-set speed limits.
- Operation under any light conditions.
- Ease of operation, Unmanned.
- Special software for picture archiving & processing.
- Remote on-line transfer of images possible.
- Remote control of radars and VMS.
- Seamless integration with VMS software and radar.
- Very low bandwidth usage.



System Benefits

- Show speed alert on VMS, change driver's behaviour.
- Establishing the speed zone of new or existing speed limit or enforcement practices.
- To determine speeds at the problem locations; to validate whether speeds are too high
- For traffic operation and control;
- To establish speed limits
- To determine safe speeds at curves and hill locations.
- Establishing speed trends at the local, state and national level to assess effectiveness of speed limit policy.
- To minimize accidents.

