



# City Pole

multi-function technology pole  
communications



**simec**

CITY POLE can accommodate devices for digital communication between the ground infrastructure and C-V2X vehicles to support drivers through messages and information and alarm signals that appear directly in the dashboards of vehicles in transit. CITY POLE has a series of optional equipment designed to be seamlessly integrated into the elegant shape of the pole that provides, manages the power supply, checks its correct operation and protects the equipment from weather agents and any vandalism.

CITY POLE is equipped with a series of validated accessories that, installed onboard in various configurations, allow fast and reliable deployment of the infrastructure you want to create, configuring each pole with the desired devices so that it adapts in the best way to the stretch of road entrusted to its control.

## v2x Hotspot DSRC

Vehicle to Everything (Cellular mode) (Wi-Fi mode) Dedicated Short-Range Communications (Wi-Fi mode)



All-in-one integrated professional radio system: designed to ensure reliable V2x communication between the ground infrastructure and the latest generation vehicle OBUs (On Board Units)

Simultaneously handles multiple C-V2X and DSRC connectivity standards

The internal software environment provides 4 levels of security: nested from kernel to application that ensure the protection of STP RSU C-V2x from cyber attacks

Set of 6 antennas combined into an all-in-one mechanical solution: ensures optimized coverage of a road segment by minimizing radio emissions outside the road area.

Expandable: It can host local management logic thanks to its multi-core ARM platform and compute, memory and storage resources.

# City Pole

multi-function technology pole modules



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## CCTV Module

- 5 M-PIXELS - Lightfinder
- Enhanced IR and Forensic WDR
- Resistant – Robust - Easy to install
- Remotely manageable zoom and focus
- Configurable streaming - Local I/O
- Can be integrated onBoard with AID software (Automatic Incident Detection)
- Can be integrated onBoard with ewc software (Environment Weather Condition)

## 2 Lanes ANPR Module

- 5 Mpixel ANPR - 2 lanes single or two-way traffic - OCR
- Alarms – Data – Statistics - Traffic status alerts
- Images and video streaming stored directly locally on SD card or SSD or sent to the supervisory system
- ONVIF profile S FTP, XML-RPC (over HTTP or HTTPS)
- A.I.D. on board with alarms of: slow traffic, queue, wrong way vehicle, presence of smoke/fog, stationary vehicle.
- Statistical reports: counts, type, speed, etc.

## Radar & CCTV 2 Lanes Module

- Latest generation radar and CCTV camera in the same product: specific artificial intelligence algorithms
- It allows to operate traffic detection systems on 2 lanes
- Single or two-way traffic: accurate 3D image definition
- The opening and orientation of the lobe are synthetically managed via software adapted to the installation scenario
- The camera allows you to validate the radar tracking of vehicles classification. Speed detection > 1% 250km/h

## Multi Function Smart Camera Module

- 2-lane coverage, single or dual direction
- 5 Mpx OCR IR cam, Color video recording, DVR function
- Day&Night varifocal 2 Mpx @60fps color contextual camera
- Free-running license plate reading up to 250 km/h
- Day and night video classification Vehicles 5+1 classes (truck, bus, car, motorcycle, van + unknown);
- Daylight Video Recognition of vehicle manufacturers
- Complete suite of AID alarms: stationary vehicle, accident detection, pedestrians, slowed traffic; Queue, Smoke-Fog, Objects detected on the roadway, Opposite direction