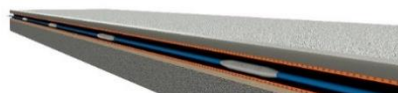




Product description

Trajector is system designed for city streets and roads. The system is capable of accurately detecting vehicle trajectory (speed, direction, following distance). Furthermore, traffic jams can be detected and scale of thereof measured, including length and number of vehicles. Speed of passing vehicles can be measured, thus the system can be used as a substitute for lidar or radar solutions. The system is based on MagSense sensors - a 3-axis magnetic field sensor,

utilizing Linux based MagSense parking controller and an expert-system and web interface for data retrieval. Detection loop consists of magnetic field sensors and robust cable connected using high-speed data BUS. The compact sensor size enables embedding detection loop into asphalt by micro-trenching method.



Benefits

- Accurate detection in all weather and traffic conditions
- Completely stealth system protected from any kind of external influence
- Multiple traffic lanes controllable with a single device
- Real-time visualization of traffic conditions on multiple lanes
- Easy integration with existing traffic infrastructure
- In accordance with the EU Guidelines on "Invisible" Installations

Features

- Reliable detection of queued vehicles, and the length of the queue
- Reliable vehicle speed detection
- Reliable vehicle following distance measurement
- Reliable counting of queued vehicles
- Reliable detection of the driving direction

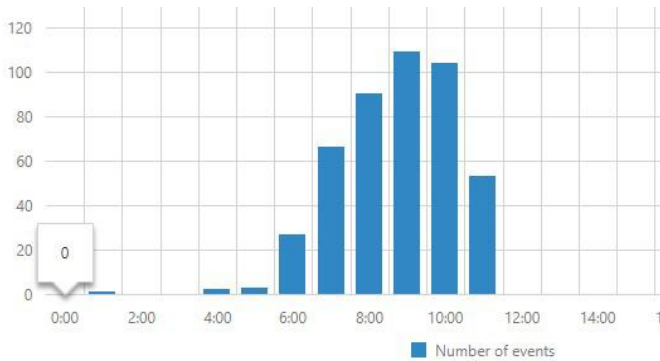
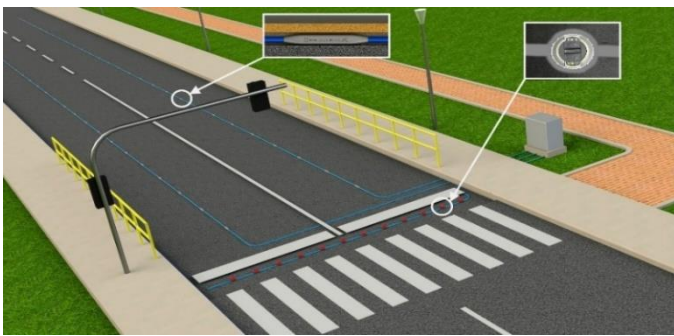
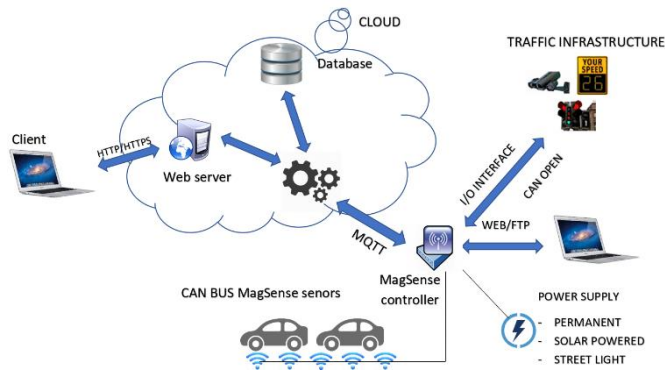
Application

- Highways
- Intersections and junctions
- Roundabouts
- Ferry ports
- City streets
- Truck stops and parking lots
- Smart cities

Sensors, and its cable are protected from vandalism and all kinds of accidental destruction from road maintenance vehicles (i.e. snowplow, cleaning and painting machines). Underground installation also ensures less environmental stress (temperature, pressure and vibration) and better durability of

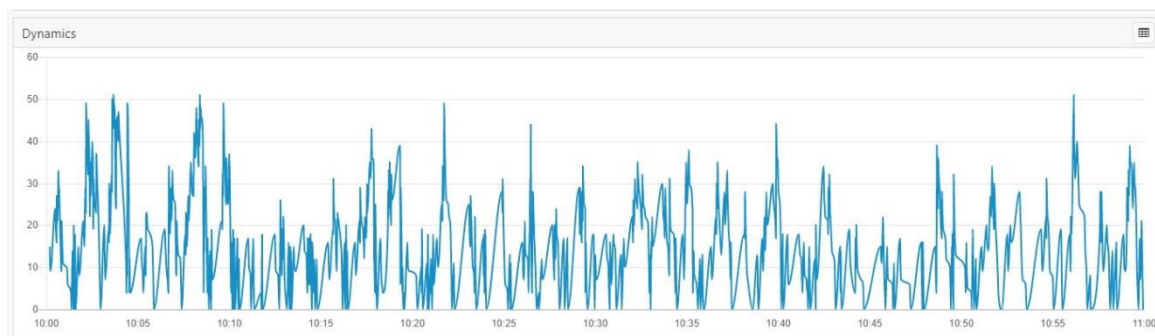
sensors. The system provides excellent accuracy in all environmental and weather conditions. The system can be easily integrated with other devices based on CAN network, as well as combined with other sensors for a higher level of data processing.

System overview



Technical specifications

System power supply	12 - 16 V DC
Cable diameter	9,2 mm
Sensor dimension	110 mm x 13.5 mm x 9 mm
Sensor current consumption	10 mA @ 16 V
Communication with sensors	CAN bus, 125 kbps
Communication with device	Ethernet / LAN (4G, WiFi optional)
Detection	Magnetic field detector
Sensor protection	IP 67
Sensor installation	Into the floor/ground, under the road surface
Snowplow resistant	Yes
Detection accuracy rate	Above 98%
Sensor operating temperature	-20.... +75 °C
Sensor bus per controller	Up to 8 (depending on the controller type)
Max sensor per bus controller	80 / 16V
Max cable length	200 m
Distance between sensors	Standard dimension, 1,5 m



Minimum	0
Maximum	51
Average	17
Number of values	1323