

# Noncontact IoT Vehicle Detection Sensor

## CARDET SERIES

CARDET series present the innovative solutions for detecting cars on both outdoor and indoor road, and it can replace a loop coil and IR sensors with much higher accuracy. CARDET does not need the high cost of ground construction, do not respond to humans or snow, and it has an exceptional long product life, high reliability, low energy consumption.

CARDET is composed of two innovative sensor modules of a FS(feedback stabilizing) magnetic sensor and a DI(Digital Integral) proximity sensor. The FS magnetic sensing technology enables to maintain the original detection space and sensing characteristics against various magnetic noises on the road. Also DI proximity sensor of CARDET includes the digital measurement structure that has the higher reliability and accuracy.





## CARDET SERIES

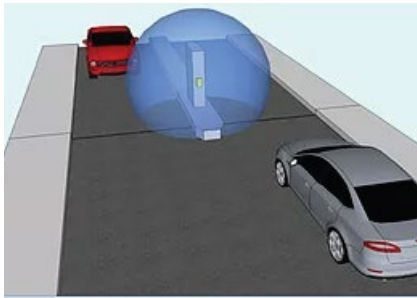
### Noncontact IoT Vehicle Detection Sensor

- **CARDET-101:** Omni-directional detection space
- **CARDET-301:** Uni-directional detection space
- **CARDET-201:** Parking sensor for the parallel parking space
- **CARDET-PR:** Outdoor parking sensor or Multi purpose (DI proximity sensor)

#### CARDET-101

##### Omni-directional vehicle detecting sensor

CARDET-101 has the detection area of a sphere shape using Feedback Stabilizing technology. It detects the vehicle that is passing through the sensing space with all directions, and the detection distance is about 1.5m for a full-sized sedan.

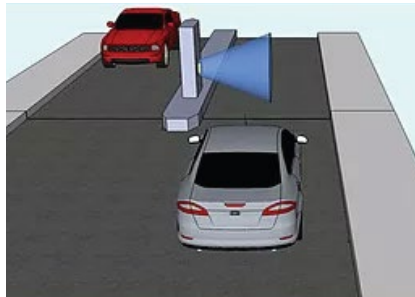


CARDET-101 is the best for controlling an automatic door, alarming light, antiseptic dispenser (disinfecting work), etc. CARDET has a variety of accessories including RF transceiver, logic board, LAN interface etc.

#### CARDET-301

##### Uni-directional vehicle detecting sensor

CARDET-301 has an uni-directional detection characteristic that has a capability of detecting only the vehicle in front of the sensor. It is the unique function of MAGO technology among magnetic based sensors in the world, because a conventional magnetic sensor also detects cars behind the sensor.



CARDET-301 has the capability of making precise trigger signals for the connected device, so it is suitable for controlling a toll bar, LPR system and counting vehicles, etc.

#### CARDET-201

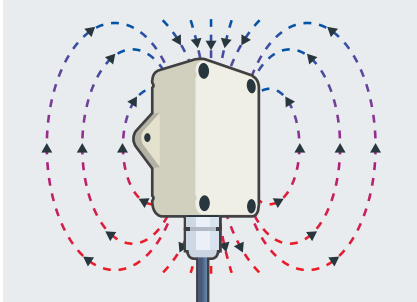
##### Parking sensor for the parallel parking place

CARDET-201 parking sensor was developed for the parallel parking space, and for being installed under the surface of the ground. CARDET-201 has the Feedback Stabilizing magnetic sensor, special digital filters and the optimized algorithm for parking detection. It has smart algorithms for the long time parking and protection from other passing cars. User can easily build up the unmanned parking control system with this sensor.



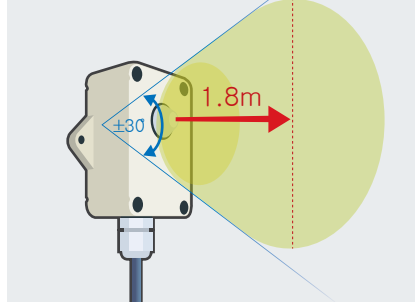
#### Feedback Stabilizing Magnetic Sensor in CARDET

Unlike the conventional magnetic sensor such as a 3-axis magnetic compass module, CARDET has the unique technology of FEEDBACK STABILIZING magnetic sensing measurement, so it shows the ultra stable characteristics of sensing performance for vehicle detection on the road. CARDET shows the whole different superior performance and stability compared than other conventional magnetic sensors.



#### Digital Integral Proximity sensor in CARDET

MAGO technology developed the special kind of DIGITAL INTEGRAL proximity sensor to filter out various noises on the road, which has a completely different structure from the conventional ultrasonic sensor. The digital signal processing algorithm inside DI Proximity sensor guarantees stable outputs under various noises on the road. CARDET-301 has the longer detection distance of 1.8m.



#### CARDET-PR

##### Multi-purpose intelligent vehicle sensor

CARDET-PR has an unit of DIGITAL INTEGRAL Proximity sensor that is optimized for using on the road outside. The sensor has an intelligent logic algorithm and the accurate measurement function of extracting the exact signals of the target object from the noisy environment. CARDET-PR can be used for various situations for detecting vehicles. One of the applications is to detect the vehicle at the parking place as the figure.

