

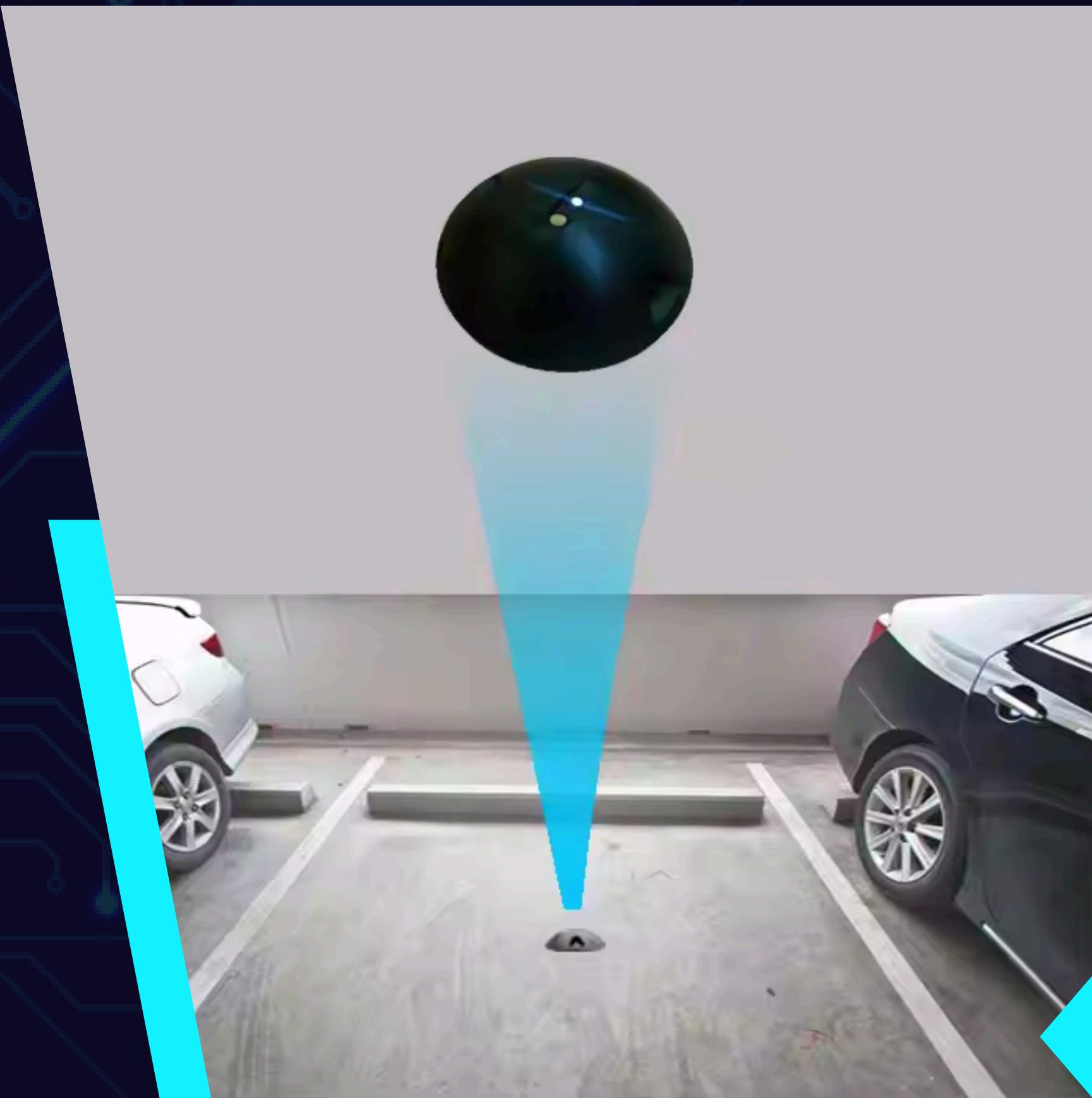


SMART PARKING SYSTEM



WHAT IS SMART PARKING SYSTEM ?

A smart parking system is an advanced parking solution that leverages technology and data to improve the efficiency and convenience of parking.





CHALLENGES IN TRADITIONAL PARKING SYSTEM

01

Limited Availability Information:

- Drivers often struggle to find available parking spaces because real-time information is not provided.
- This leads to increased traffic congestion and wasted time.

02

Inefficient Space Utilization:

- Parking spaces may be poorly marked or managed, resulting in suboptimal use of available space.
- Overcrowding in some areas while other spaces remain underutilized.

03

Lack of Security:

- Traditional systems often lack robust security measures, making vehicles more susceptible to theft and vandalism.
- Insufficient surveillance and monitoring can also pose safety risks for drivers and pedestrians.



WHAT MAKES PARKING ‘SMART’ ?

The main function of this smart parking system is to detect the empty parking slots for the people who are looking for it. It makes it more accessible to the people due to usage of website and location coordinates of the google maps.

- **Integration of IOT**

IOT is used here to sense the cars by the usage of IR sensor and that slot is showed occupied in the website. The remaining empty slots can be reserved subsequently.

- **Key features**

1. Works on real time
2. Cashless payments
3. Guided navigations
4. Easy to use
5. Saves a lot of time





COMPONENTS

01

Hardware

1. Sensors
2. Cameras
3. Parking barriers

02

Software

1. Website
2. Google maps

03

Connectivity

1. IoT protocols
2. GPS integration

