

CTi



## Outdoor Lighting Control and Monitor System

Reduce power costs and light pollution with our Smart Antenna SA-2

## Facts And Statistics:

Lighting that emits too much light or shines when and where its not needed is wasteful.

According to the IDA (International Dark Association) 13% of residential electricity use in the U.S. is for outdoor lighting. 120 Tera watts-hour of energy is consumed by outdoor lighting, mostly to illuminate streets and parking lots. The IDA estimates that one-third of all lighting in the U.S. is wasted which is about two billion dollars annually.

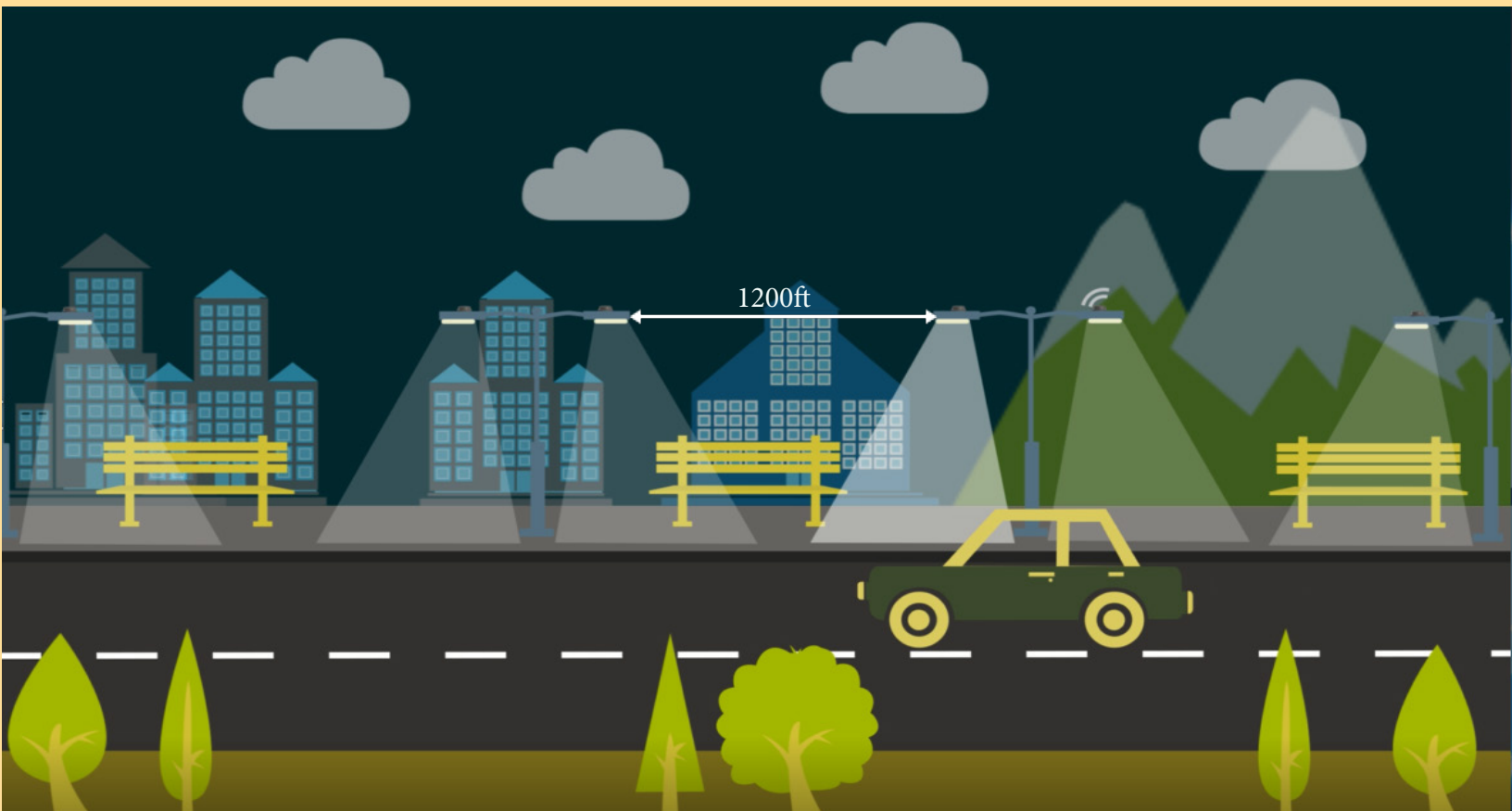
## What does our system do ?

Our outdoor lighting control and monitor system controls outdoor lights and monitors bulb failures. It has a smart antenna, connected to a mesh network. The smart antenna is a programmable cloud-based device, which can be connected to any electrical system as a cellular control or monitor device.

The mesh network connected to the smart antenna has a wide connectivity range (1200ft) . It monitors bulb failure and optimizes light performance based on humans, cars, and weather conditions.

The antenna switches bulbs on and off based on the day time and the weather condition, and it changes light intensity based on cars' and humans' motion.

This system is compatible with DALI protocol (Digital Addressable Lighting Protocol), which is a trademark for network-based systems that control lighting, specifically for 0-10 V lighting control systems. Lighting levels are specified by an 8-bit value where 0 means off and 254 means full brightness.



The most common problem with outdoor lighting is burnt bulbs, and the second most common problem is malfunctioning connections.

As soon as the system detects a bulb failure the antenna sends a signal to the nearest cellular tower, which transmits data to our control system then it sends data through cloud to the cellular devices of the concerned party.

