

SecurOS® Soffit

Pedestrian Protection Made Easy

Intelligence-driven
illumination to
prevent accidents
and protect people



Technology Overview

The SecurOS® Soffit is an intersection safety system that escorts pedestrians using artificial intelligence (AI)-driven dynamic illumination to prevent traffic accidents involving people at crosswalks.

It is a hybrid product that combines purpose-specific hardware with powerful analytics software to provide functionality that is not available from either an analytics company or a video or lighting provider.

The hardware includes an IP camera system and a powerful, aimable lighting array that only illuminates the pedestrians and does not affect the vision of approaching drivers. The analytics functionality uses the video stream to identify and track the position of pedestrians and directs the lighting array to illuminate the detected pedestrians - escorting them as they cross the street.

Applications



Safe Cities



School Zones



Crossroads



Transportation
Hubs



Venues and
Arenas



Healthcare
Campuses

Key Features

DYNAMIC PEDESTRIAN ILLUMINATION

Directed light of LEDs illuminates only pedestrians and does not limit the driver's visibility.

MULTIPLE ILLUMINATION MODES

Constant and pulsating illumination modes are supported.

OUTDOOR PROCESSING UNIT

Includes processing unit in a temperature-controlled cabinet and IP66-rated camera enclosure.

WORKS WITH OTHER SECURUS® MODULES

Integrates seamlessly with other SecurOS® modules to help detect additional road safety violations.

STATIC CROSSING ILLUMINATION OPTION

White light LEDs shine during standby mode to provide static illumination that can be used instead of regular pedestrian crossing lights.

THIRD-PARTY INTEGRATIONS

Soffit allows for transmission of video & statistical data to third-party security systems via standard HTTP/REST API interfaces, as well as communication with traffic control systems.

Specifications

White Light LED Illuminator

Type of Illumination	LED, white light
Illumination entity	Ground pedestrian crossings
Backlight control	Automatic, program control
Illuminated area length	up to 49.2 ft (15 meters) — 4 lanes
Illumination of a pedestrian crossing (lux)	At least 45 lux in standby mode; At least 60 lux in active mode

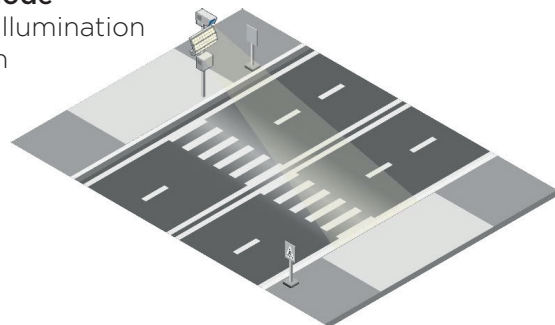
Operational Characteristics

Bracket	On a vertical post by brackets
Height of mounting regarding the road surface (m)	20 ft ... 21.3 ft (6.1 ... 6.5 m) — for white light LED illumination and an IP-camera; 11.5 ft (3.5 m) recommended (not less than 8.2 ft (2.5 m)) — for video analytics controller
Power consumption (W)	No more than 1,000 W
Voltage of the power supply	110 ... 240 V, 49 ... 51 Hz
Operating temperature range (°C)	-60°C ... +40°C
Class of protection	IP66 for white light LED illumination and IP-camera; IP55 for video analytics controller
Weight	SecurOS® Soffit (by itself): 26.5 lbs (12 kg); SecurOS® Soffit (with brackets and outdoor cabinet): 122.8 lbs (55.7 kg)
Value of average workflow (hours)	20,000 hours
Average service life before major maintenance (years)	At least 5 yrs (if regulatory work conducted)

SecurOS® Soffit at Work

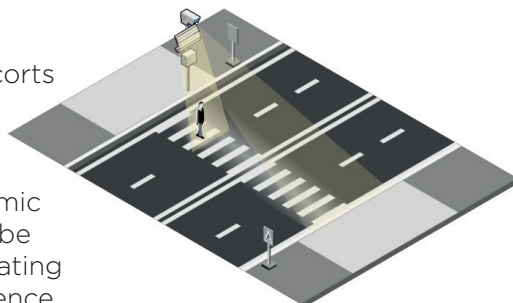
1. Standby Mode

Emits static illumination to pedestrian crossing.

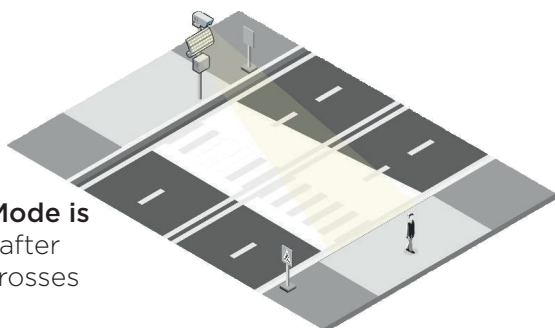


2. Active Mode

continuously escorts a pedestrian walking through the crosswalk. Dynamic illumination can be constant or pulsating based on preference.



3. Standby Mode is re-engaged after pedestrian crosses the road.



Soffit Camera, Illuminator and Analytics Controller

