QUANERGY®

Case Study - Major International Delivery Solutions Provider

Perimeter Intrusion Detection/Loss Prevention

Challenge

A major international delivery solutions provider was experiencing a loss of parcels at their distribution centers due to packages thrown over the fence by warehouse employees. They also wanted to detect any intruders in large open areas.

Quanergy Solution

A solution consisting of MQ-8 3D LiDAR sensors and QORTEX perception software as well as M1-Edge PoE 2D LiDAR sensors combined the best of 3D with 2D. M1 Edge PoE created a curtain across the entire fence line and detected the smallest of objects being thrown over the fence, even a pen/sharpie. While the 3D part of the solution enabled hyper accurate detection as well as continuous tracking of people in large open areas. All of these insights were sent to the customer's existing video management system thanks to seamless integrations offered by Quanergy.

Outcome

The customer benefited from a significant reduction in package loss and theft. They also reduced false alarms by an order of magnitude and never missed an actual alarm even when dealing with acres or open areas.

Solution Overview

Quanergy's LiDAR-based portfolio is rapidly becoming the security solution of choice for critical infrastructure sites with over 100 sites already. Due to its ability to combat alarm fatigue by dramatically reducing costly false alarms, Quanergy's solutions bring the operators' attention to what really matters most by focusing on real threats and providing actionable insights with hyper accuracy. After deploying Quanergy's solutions, which results in a dramatic reduction in false alarms generated by their legacy perimeter intrusion detection (PID) systems, customers can reduce the number of expensive guard services helping save tens if not hundreds of millions of dollars each year. This also enables a more efficient allocation of resources.

Quanergy's solutions allow customers to keep leveraging existing investments by augmenting their camera-based PID systems, enabling them to locate with unprecedented level accuracy the exact location of a potential intruder. Quanergy's solution addresses all major mission-critical security use cases including perimeter intrusion detection, server rack and cabinet security, mobile security towers, man trap/vestibule access controls, and rooftop security through the following core competencies:

- Only provider of seamlessly integrated 2D/3D LiDAR sensors and software solutions
- Products for all use cases, be it detecting really small objects or continuously tracking objects throughout a large perimeter
- Over 95% reduction in false alarms
- 95% object (people or vehicle) detection, tracking and classification accuracy
- 360° 3D coverage and up to 15,000 square meters of coverage per single sensor
- No privacy concerns or recording of Personal Identifiable Information (PII)
- Ability to create a mesh network of sensors/servers and continuously track an object as they move across the entire site, virtually for an unlimited range
- Broad integrations ecosystem with over 30 integrations with leading VMSes such as Genetec, Milestone, Flir, Hanwha, Network Optics, Surveil, and Mirasys and ONVIF based camera vendors such as Flir, Axis, Bosch, Hanwha and other solutions such as PSIMs and Analytics platforms, etc