

## **SUMMARY**

Shopping malls are all about optimization. From lighting and temperature to layout and interior design, a great deal of attention is given to crafting the most pleasant customer experience and, for the mall itself – the most lucrative one. This optimization is usually for variables the mall can fully control. What about those it can't?

This optimization is usually for variables the mall can fully control. What about those it can't?

One of the primary KPIs shopping malls rely on is how well customer traffic converts to profits. In other words, whether your client is actually engaging in commerce or just window shopping.

The problem is – measuring this conversion is easier said than done.

## **CHALLENGE**

The first half of this measurement is pretty straightforward, as each store routinely reports its profits to the mall's administration. The challenge is in measuring the traffic.

Most shopping malls have more than one entrance. Even once a potential customer comes in through one, they won't be following any established path. This means that to have the best data, you'll want to spread your sensors and measure traffic in multiple locations and use the magic of statistics to figure out which areas are wallet-openers and which ones aren't.

This spread of devices complicates the process, as each sensor needs to be connected to an aggregating server where the data is processed and analyzed. This isn't an issue for a small space, but the average shopping mall's size means a wired connection would be cumbersome and costly.



A wireless solution is the only feasible way to get valuable data effectively, so ensuring the connectivity of each device becomes the primary concern.

#### **SOLUTION**

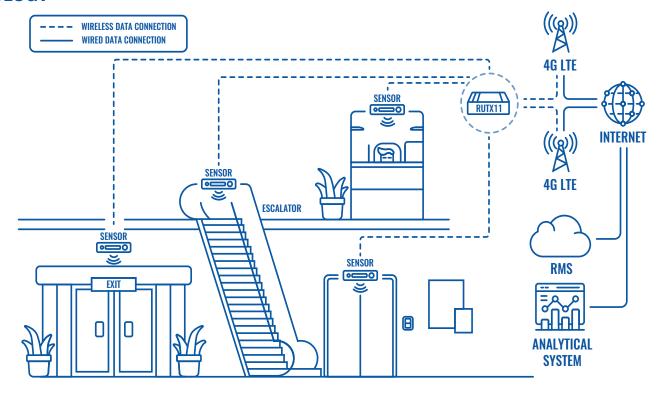
When it comes to ensuring connectivity in a large area, your regular home router isn't making the cut. An industrial route, such as our RUTX11, is the one fitting such a task.

Boasting LTE Cat 6, this cellular router broadcasts a powerful, high-speed internet signal to the sensors and acts as a wireless data bridge between them and the server using the standardized IPv6 protocol. That wireless signal is strong enough that multiple sensors across the shopping mall can connect to a single RUTX11, simplifying the network

Importantly, this easy-to-install device comes with built-in advanced security features and includes dual SIM functionality with auto-failover and backup WAN, among other features, guaranteeing a steady, uninterruptable connection.

Using RUTX11, your traffic is measured effectively, efficiently, and continuously. No ifs. No buts.

#### **TOPOLOGY**



# **BENEFITS**

- Multiple security measurements and safeguards to prevent connectivity loss, including dual SIM functionality with auto-failover and backup WAN, ensure that the RUTX11's network remains stable and no data is lost.
- Its strong, high-speed LTE Cat 6 internet signal covers a large area, providing an excellent internet connection to multiple devices covering a lot of ground, thereby keeping your network as simple as possible.
- Supporting a wide range of protocols, including MQTT, Modbus TCP, BGP, and GRE, gives the RUTX11 the flexibility to facilitate data transmission however you wish to work with it.
- Numerous mounting options, including DIN railing, make this device easy to install in any part of a shopping mall's space.



# **WHY TELTONIKA NETWORKS?**

Shopping malls are all about optimization, and optimizing your traffic measurement means utilizing a top-level source of connectivity. This level is the baseline for our portfolio of devices.

Quality, security, and reliability aren't factors you can only hope for but foundations you're guaranteed to have. When you choose Teltonika Networks, you choose optimization. That is our promise.

