

Supply Chain Identification: Logistics Unleashed

Global truck brand aims for zero errors on outbound orders with RFID.



Lack of buy-in from upper management is cited as one of the top three barriers to achieving supply chain success."

AD Global Supply Chain Research, 2022

Epic in both scale and throughput, this global truck brand's parts warehouse and DC is 80,000m². The outbound building is 200m long and handles hundreds of thousands of orders a year from around the world. Mistakes in orders or lost consignments are expensive to manage. From an end customer perspective every order is urgent, and using RFID ensures they receive exactly what they request.

The Challenge

How to increase the speed of order fulfillment while reducing the opportunity for lost orders and shipment queries.

The Solution

In a large distribution center a handling unit can easily get lost unless it has a digital location tracker. Solution provider Mieloo & Alexander studied the distribution center (DC) and created a digital twin of the zones and processes. By placing a ceiling mounted real time locating system based on passive UHF RFID technology throughout the DC a tracking software identifies shipments from the moment they enter the outbound staging zone to the moment they are successfully loaded onto a vehicle.

The RFID system provides a precise location for each handling unit, which can be seen in each zone. The client can determine rules for each zone, for example if a handling unit is in the blue zone, it is ready for shipment. The magic is automating the process. A conveyor brings the RFID labeled handling unit into the outbound building, and it is automatically transported to the relevant staging zone for its destination country. Once the transport for that country arrives, the driver of the forklift sees on their screen that the handling unit needs to go to the relevant loading area, and finally onto the truck. The system follows the handling unit through each zone. Having completed each stage in the correct order it is logged as a successful process. RFID based systems are enabling DCs in the automotive industry to achieve near zero errors on outbound orders.

The Result

- Prevention of loading errors and OEM penalties
- Eliminating missing order search times and efforts

The Benefits

- Cost savings
- Improved data quality
- Increased customer satisfaction
- Compliance



To learn more about how Avery Dennison RFID solutions can help your business, visit rfid.averydennison.com

