



PACKING QUALITY ASSURANCE

**COMPLETE
SOLUTION PACKAGE**

DO YOU OPERATE A LOGISTICS CENTRE OR AN E-COMMERCE SHOP?

E-commerce has been growing faster than ever – more than a quarter of global population is shopping online nowadays. This means hundreds of billions of packages are being shipped each year and before they ship the need to be packed. Considering those numbers and the fact that the shipments are usually prepared by humans, some of those packages might be missing items or be delivered damaged. Solving customers' disputes is not only time-consuming, but also generates losses if the products are replaced without proof of not being packed or that the package was shipped undamaged.

Konica Minolta Video Solutions Services offers not only advanced security systems, but also provides an efficient dispute management platform in the event of broken packaging or missing items.



MOBOTIX M73



MOBOTIX S74



1 HIGH RESOLUTION PROOF

The cameras monitor the packing station 24/7 providing a high resolution image – up to 4K – to capture all the important details.

2 SCALABILITY

The system can grow as your needs expand. One piece of software will integrate the packing quality assurance solution with your security system (both new and existing), and even access control system or an automatic license plate recognition system for easy gate control (also offered by Konica Minolta).

3 FLEXIBILITY

Depending on the installation preferences, the camera can be mounted on a wall or a ceiling, but also – due to a unique modular design- the camera modules can be integrated to an existing packaging station right above the packing table. This way the camera system is unobtrusive and positioned closest to the goods being packaged ensuring highest quality of recordings possible.

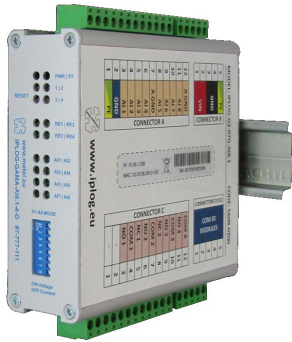
4 ACCESSORIES



Special mounting accessories for the S74 series allow for a versatile installation.

INDUSTRIAL PLC

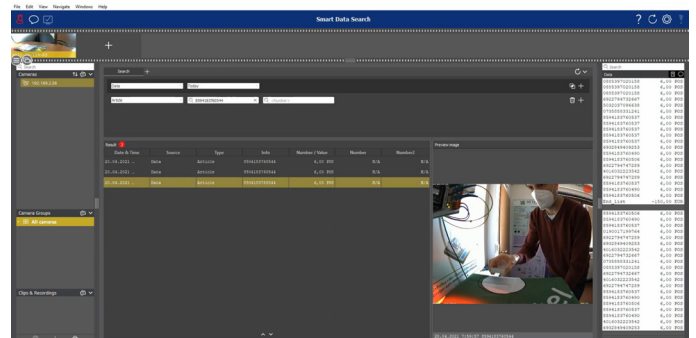
Each barcode scanner is connected to an industrial-grade controller (via TCP/IP or serial port) that connects the video data with corresponding barcode scanned at the package.



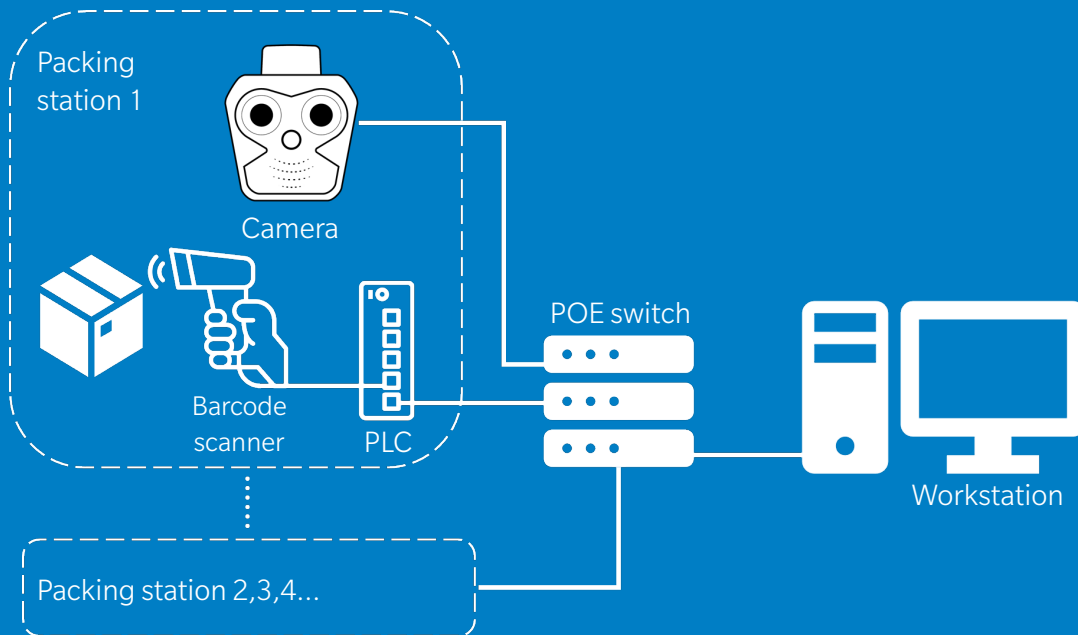
EASY-TO-USE INTERFACE

When needed, a video clip from the box packing or dispatching can be searched in a matter of seconds. Upon barcode information input, a video is immediately retrieved and the necessary proof can be easily exported.

This can be done on a regular compatible PC, by anyone who is authorized, any time, even remotely.



EXAMPLE ARCHITECTURE



HOW DOES IT WORK?

The „packing quality assurance“ package contains of a high resolution camera monitoring the packing process at all times, a barcode scanner that allows for a quick identification of each package and an industrial grade PLC (programmable logic controller) that acts as a metadata collector and integrator.

Shall a package be challenged by a customer or a shipping company, an easy-to-use software allows you to immediately find a clear recording of the package in question simply by its number that was associated with the barcode scanned during the packing or assembling process.

When will you most appreciate this system?

- Customer claims a product was **missing** from their package
- Shipping company insists the package was **damaged** when picked up
- You suspect your employee **not packing fragile products appropriately**
- A product from one order is put in a **wrong box** and shipped to another customer

MODEL CALCULATION

Each packing station includes:

Mobotix camera

Operating software

Industrial grade metadata PLC

PoE switch (shared between stations)

Total cost

1700 EUR

Handheld barcode scanner (needs compatibility confirmation)

starting at 200EUR



» Manual searching through hours of recordings to find that one package is a total nightmare!. «

E-commerce entrepreneur

WHAT IS YOUR RETURN OF INVESTMENT?

SCENARIO 1

Konica Minolta's partner, automotive industry.

The main logistics center and warehouse upon receipt of an order from one of its branches collects all of the products in a plastic container that circulates on industrial conveyor belts between different collection stations where employees insert the ordered parts into the collective box which then is closed and shipped out.

Problem: Due to human error, the collection boxes arrive at local branches with either wrong or missing products. According to the customer this happens up to 20 times a day. The dispatch employee manually searches all of the recordings from the shipping day and checks if the dispute has grounds. This may take up to 20 minutes of the dispatcher's time per each dispute. This has direct impact on the productivity of the employee, stops the packing process or requires hiring a dedicated person to search and recognize the needed recordings.

Solution: Konica Minolta's solution allows the dispatcher to find the box in question and confirm the contents within 2 minutes. Assuming a part-time employee was required to manually search through the recordings, the return of investment can occur as fast as 4 months following installation (assuming one packing station).



MOBOTIX S74



MOBOTIX M73

SCENARIO 2

Konica Minolta's partner, e-commerce logistics.

This middle-sized online shop sends out on average 350 packages each week. The value of the shipped products varies, but the average order is 200EUR (below the AOV of 282EUR for 2019, by Wolfgang Digital KPI Report). The online orders are collected then the package is assembled by an employee, shipping label is attached and the order is shipped out.

Problem: There are a couple of issues related to customer complaints: missing/wrong products (due to a human error), customers' fraudulent claims of missing items that were actually shipped and reception of damaged packages.

Currently, without the packing process being monitored, when customers report missing items, the practice is to send out the missing products again, assuming the claim is legitimate. Unfortunately a small number of disputes are false (estimated 5-15%) and the items are shipped again, since there is a lack of proof of them being shipped. This not only generates losses for the replacement products themselves, but also additional shipping costs and the man-hour costs (collecting replacement items, repacking, filling out paperwork, etc). Assuming extremely optimistic scenario – 2% of total orders being questioned, and only 5% of them being fraudulent, the return of investment can occur as fast as within the first month following installation (assuming one packing station).

Solution: Konica Minolta's solution enables the merchant to reject false claims upon visual confirmation of the items in question being in fact in the package. This applies also to "wrong product", "damaged product" and "damaged package shipped" claims both by customers and shipping companies.

FRIENDLY FRAUD

A process in which a customer makes an online purchase, then contacts their credit card issuer to dispute the charge. Most commonly claimed reasons are: "the product was damaged", "the retailer shipped the wrong product" or "the product was missing".

40%

OF CUSTOMERS WHO COMMIT
„FRIENDLY FRAUD“ WILL DO IT
AGAIN WITHIN 60 DAYS

\$25B

ESTIATED LOSSES OF MERCHANTS
DUE TO „FRIENDLY FRAUD“ IN
2020

1.5%

OR MERCHANTS' TOTAL REVENUE
ACCOUNTS FOR THE „FRIENDLY
FRAUD“

FBI CLAIMS

THAT IT IS ONE OF THE
TOP 3 THREATS TO
E-COMMERCE BUSINESS